THE REASON WHY ETHIOPIA'S FIRST FILLING OF THE GRAND ETHIOPIAN RENAISSANCE DAM (GERD) VIOLATED THE EQUITABLE AND REASONABLE UTILIZATION PRINCIPLE AND TWO LESSONS FROM THE MEKONG AND INDUS RIVER BASINS

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DEDICATION

I dedicate this master's thesis to my mother Aynalem Ashebir (Ayni) and my father Dr. Teshome Teklu (Ababi), both of whom vehemently disagree with my conclusions. From beginning to end, they never tired of pointing out that equitable and reasonable utilization is neither equitable nor reasonable. I thank them for that and, of course, everything else.

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ABSTRACT

This thesis addresses the legal issues around Ethiopia's first filling of the Grand Ethiopian Renaissance Dam (GERD). The construction of the dam on the Blue Nile river raises concerns among Egypt and Sudan, the other riparian states on the river. Ethiopia contributes all the waters of the Blue Nile river but had not benefited from the river, whereas Sudan and Egypt utilize the river for hydroelectric power generation, irrigation and consumption. Recently, Ethiopia built what is projected to be the largest hydroelectric dam on the African continent. Egypt and Sudan worry that the dam will give Ethiopia control over the waters of the Blue Nile. This thesis explores the development of international water law principles from the late nineteenth century to the present day. Those principles have gained acceptance by the Blue Nile riparian states and are incorporated into the most recent agreement they signed in 2015. One of the principles of international water law Egypt, Sudan and Ethiopia agreed on is the principle of equitable and reasonable utilization. This principle requires all riparian states to take into account the interests of the other riparian states. This thesis argues, Ethiopia violated the equitable and reasonable utilization principle during the first filling of the GERD because it failed to take into account the existing uses of the Blue Nile river which allocates all the waters to Egypt and Sudan.

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INTRODUCTION

Quietly flowed the Nile until one day Sudan noticed a significant drop in the water levels coming from its eastern neighbor Ethiopia. For days, the water did not return to a level that was normal for the season. On July 15, 2020, Sudan announced that the water levels of the Blue Nile river coming from Ethiopia had been reduced by 90 million cubic meters or 0.09 billion cubic meters (BCM) per day.[1] Satellite images of the Ethiopian hydroelectric dam, also known as the Grand Ethiopian Renaissance Dam (GERD), released by the European Space Agency corroborate the Sudanese announcement. Images taken by the Sentinel-1 satellite between June 27 and July 12, 2020, showed a steady increase in the amount of water behind the GERD.[2]

On several occasions, Ethiopia had announced it would conduct the first filling of the dam in July 2020. July is a rainy month in the Ethiopian highlands. The filling of the completed portion of the dam's reservoir, also called the first filling, allows work to continue on uncompleted portions of the dam while the completed reservoir is filled.[3] On July 7, 2020, Prime Minister Abiy Ahmed expressed his government's determination to carry on with the first filling. In a statement to Ethiopian lawmakers, he said: "If Ethiopia doesn't fill the dam, it means Ethiopia has agreed to demolish the dam."[4]

Fully aware of Ethiopia's intentions, Egypt turned to the United Nations for help. On June 19, 2020, Egypt requested the UN Security Council to intervene in its dispute with Ethiopia

[1] Reuters, *Sudan says Nile water levels fall after Ethiopia starts giant dam*, (Jul. 15, 2020, 11:52 AM), https://www.reuters.com/article/ethiopia-dam-sudan/sudan-says-nile-water-levels-fall-after-ethiopia-starts-giant-dam-idUSC6N2CH02H.
[2] Cara Anna, *Satellite images show Ethiopia dam reservoir swelling*, Associated Press, (Jul. 14, 2020), https://apnews.com/600710323bb9bb4427a3d3b9a3115bae.
[3] Damian Zane, *Ethiopia's River Nile dam: How it will be filled*, BBC (Jul. 16, 2020), https://www.bbc.com/news/world-africa-53432948.
[4] Declan Walsh, *As Seasonal Rains Fall, Dispute Over Nile Dam Rushes Toward a Reckoning*, N.Y. Times, (Jul. 18, 2020, https://www.nytimes.com/2020/07/18/world/middleeast/nile-dam-egypt-ethiopia.html.

regarding the latter's plan to fill the GERD reservoir.[5] The UN Security Council met ten days later to discuss Egypt's request. The meeting was held virtually due to the coronavirus pandemic. The Security Council concluded its meeting by issuing a press release which stated that the differences between Egypt, Ethiopia and Sudan can be overcome and that the United Nations stands ready to support talks to settle remaining differences between the three countries.[6] The Security Council's press release also noted that "an agreement can be reached should all the parties show the necessary political will to compromise in line with the spirit of cooperation highlighted in the 2015 Declaration of Principles."[7] In other words, the Security Council concluded its videoconference without giving much needed guidance to any of the parties.

A UN Security Council videoconference was not at all necessary to state the obvious that political will is necessary for compromise. The issue that needed to be addressed was why the political will necessary for compromise was missing. All one must do is take at random three people who live by the Blue Nile river, preferably one from each country, and ask them why the political will necessary for compromise is not easy to find. They can articulate the issue better than the UN Security Council did. Makhluf Abu Kassem, an Egyptian farmer, told *Aljazeera*, "The dam means our death."[8] Manal Abdelnaay, a Sudanese farmer, told *Reuters*, "It is true the Renaissance dam will lower the Nile's water levels and prevent flooding. However, it will impact farming, and

[5] Reuters, *Egypt calls for UN intervention in talks on Ethiopia's Grand Renaissance Dam*, (Jul. 19, 2020, 5:39 PM), https://www.reuters.com/article/egypt-ethiopia-dam/egypt-calls-for-un-intervention-in-talks-on-ethiopias-grand-renaissance-dam-idUKL8N2DW5GU.
[6] Press Release, UN Security Council, *Grand Ethiopian Renaissance Dam Agreement within Reach, Under-Secretary-General Tells Security Council, as Trilateral Talks Proceed to Settle Remaining Differences*, (Jun. 29, 2020), https://www.un.org/press/en/2020/sc14232.doc.htm.
[7] *Id*.
[8] Aljazeera, *'Means our death': Egyptian farmers fear effect of Ethiopia dam'*, (Aug. 20, 2020), https://www.aljazeera.com/news/2020/8/20/means-our-death-egyptian-farmers-fear-effect-of-ethiopia-dam.

the Wad Ramli area is one that lives off farming."[9] And Berihun Yihune, an Ethiopian living close to the source of the Blue Nile river at Lake Tana, told *Xinhua*, "Our history is highly tied to the river and its waters. Same as our forefathers did for centuries, we continue praising the river for its greatness in our songs, and condemn it for taking our resources away from us."[10] The three individuals make their respective country's position clear: Egypt sees the GERD as an existential threat; Sudan sees it as partly beneficial for flood control and partly threatening; and Ethiopia sees the dam as a way to utilize resources it considers its own.

Following Sudan's announcement on July 15 that it had noticed a significant drop in the amount of water flowing from Ethiopia, and the absence of useful guidance from the UN Security Council, Egypt asked Ethiopia for urgent clarification on whether it has started filling the reservoir of the GERD.[11] Ethiopia's Water Minister Seleshi Bekele responded the same day by saying that the reservoir behind the dam was filling due to the heavy seasonal rains: "The inflow into the reservoir due to heavy rainfall and runoff exceeded the outflow and created natural pooling. This continues until overflow is triggered soon."[12] Whatever Seleshi Bekele's statement means, he would not say whether Ethiopia had closed the dam gates. The following day, July 16, 2020, the Ethiopian government denied that it had started filling the reservoir of the GERD.[13]

[9] Zohra Bensemra, et al., *Fears at Nile's convergence in Sudan that new dam will sap river's strength*, (Jul. 9, 2020, 6:27 AM), https://www.reuters.com/article/us-nile-convergence-widerimage/fears-at-niles-convergence-in-sudan-that-new-dam-will-sap-rivers-strength-idUSKBN24A1EC.
[10] Xinhua, *Ethiopians rejoice historic moment on disputed grand dam project*, (Jul. 25, 2020, 6:44 PM), http://www.xinhuanet.com/english/2020-07/25/c_139238424.htm.
[11] Reuters, *Egypt seeks clarification on word of Ethiopia filling dam*, (Jul. 15, 2020, 12:41 PM), https://www.reuters.com/article/us-ethiopa-dam-egypt/egypt-seeks-clarification-on-word-of-ethiopia-filling-dam-idUSKCN24G2I9.
[12] Reuters, *Ethiopia dam reservoir filling as talks with Egypt, Sudan stall*, Reuters (Jul. 15, 2020, 10:16 AM), https://www.reuters.com/article/idUSL5N2EM4OB.
[13] Reuters, *Sudan says Ethiopia denies filling the Renaissance dam reservoir*, (Jul. 16, 2020, 8:29 AM), https://www.reuters.com/article/idUSKCN24H1XR.

Despite its determination not to be forthcoming about what it was doing upstream, Egypt and Sudan kept trying to talk to Ethiopia. They even agreed with Ethiopia on July 21 to hold talks which would be mediated by South Africa.[14] The very next day, Ethiopia's Prime Minister announced that the first filling of the GERD was achieved and that the water had overflown the dam.[15] Only six days before, the Ethiopian government had denied that the first filling of the GERD was underway.[16] Egypt and Sudan were not amused. They condemned what they called Ethiopia's "unilateral filling" of the GERD.[17] Between July 15 and 22, 2020, Ethiopia had impounded a total of 4.9 BCM of water from the Blue Nile river.[18]

The Nile basin carries 84 BCM of water every year.[19] Out of that 84 BCM, about 86% flows from the Blue Nile river.[20] Rising from Ethiopia's Lake Tana[21], the Blue Nile meets its junior partner the White Nile flowing from Lake Victoria[22], to form the Nile river in Khartoum, Sudan.[23] The Nile then flows north into Egypt and eventually enters the Mediterranean Sea.[24] Extending 6,695 kilometers from the Ruvyironza River in Burundi to the Mediterranean Sea, the Nile is considered to be the longest river in the world.[25]

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[14] Reuters, *Ethiopia, Egypt and Sudan to hold more talks on Renaissance dam*, (Jul. 21, 2020, 2:41 PM), https://www.reuters.com/article/idUSL5N2ES6C9.
[15] Associated Press, *Ethiopia's leader hails 1st filling of massive, disputed dam*, (Jul. 22, 2020, 7:37 AM), Washington Post, https://www.washingtonpost.com/world/middle_east/ethiopias-leader-hails-1st-filling-of-massive-disputed-dam/2020/07/22/b3bd4e1e-cc0f-11ea-99b0-8426e26d203b_story.html.
[16] *See supra* note 13.
[17] Reuters, *Egypt and Sudan criticize Ethiopia at start of new Nile dam talks*, (Jul. 27, 2020, 3:21 PM), https://www.reuters.com/article/idUSKCN24S2H9.
[18] Kathryn Salam, *The Blue Nile Is Dammed*, Foreign Policy, (Jul. 24, 2020, 4:11 PM), https://foreignpolicy.com/2020/07/24/the-blue-nile-is-dammed/
[19] Mahemud Eshtu Tekuya, *Governing the Nile under Climatic Uncertainty: The Need for Climate-Proof Basin-Wide Treaty*, 59 NAT. Resources J. 321, 324 (2019).
[20] Abiy Chelkaba, *The Influence of the UN Watercourses Convention on the Development of the Nile River Basin Cooperative Framework Agreement (CFA)*, 12 MIZAN L. REV. 165, 168 (2018).
[21] Tekuya, *supra* note 19, at 323-24.
[22] Chelkaba, *supra* note 20.
[23] Tekuya, *supra* note 21.
[24] *Id.*
[25] *Id.*

The eleven countries sharing the Nile are: Tanzania, Uganda, Rwanda, Burundi, Democratic Republic of Congo (DRC), Kenya, Ethiopia, Eritrea, South Sudan, Sudan, and Egypt.[26] However, to say these countries share the Nile does not mean they actually share the waters. It simply means they find themselves in the Nile basin. Egypt utilizes about 85% of the waters for irrigation.[27]

The sheer number of riparian states on the Nile is already causing an international struggle.[28] An arrangement where Egypt uses almost all the waters of the Nile while ten countries share the remaining waters, if at all, would not work for those ten countries. The population living in the Nile basin states in 2018 was estimated to be 400 million people.[29] This number is growing at a rate of 3% a year and is projected to reach 859 million in 2025,[30] making the Nile River basin one of the most densely populated areas on the planet.[31] In 2016, Ethiopia contained the largest population in the Nile basin at over 99.4 million people; Egypt's population was at 86.9 million people and Sudan's at 35.4 million people.[32] By 2050, Ethiopia is projected to have a population of 278 million people, Egypt 121.8 million and Sudan 77.1 million.[33]

From the beginning, Ethiopia's construction of the GERD on the Blue Nile portion of the Nile river has been causing bitter dispute with Egypt, and to a lesser extent with Sudan. It must be noted, Sudan has not opposed the Ethiopian project as vehemently as Egypt has. On April 2, 2011, Ethiopia started construction of the GERD.[34] In 2012, about a year after Ethiopia started building

[26] Chris Richards, *International Water Rights: A Tale of Two Rivers*, 12 J. ANIMAL & NAT. Resource L. 1, 13 (2016).
[27] *Id*., at 15.
[28] Richards, *supra* note 26.
[29] Chelkaba, *supra* note 20.
[30] Tekuya, *supra* note 19.
[31] Richards, *supra* note 26, at 21.
[32] *Id*., at 17.
[33] *Id*., at 16-17.
[34] *Id*., at 15.

the dam, Sudan changed its normal course of siding with Egypt on the Nile issue and aligned with Ethiopia to support the construction of the dam.[35] It ended its more than half a century of alliance with Egypt and lent its political support for the GERD.[36] Sudan's changed position has to do with its pragmatic consideration: the loss of oil revenue after the secession of South Sudan made Sudan increasingly dependent on irrigation agriculture. Sudan sees an advantage in the GERD project which inevitably regulates the flow of the Blue Nile, a benefit it will enjoy at practically no cost.[37]

Dam construction can be an expression of power over a watercourse.[38] Historically, Egypt has dominated the use and control of the Nile.[39] Ethiopia is now challenging Egyptian hydro-hegemony and the status quo that has served Egypt so well.[40] Not just Ethiopia – the biggest contributor of the Nile waters[41], but some of the ten other basin states, due to their exploding populations and increasing water demands, are also challenging Egypt's dominance.[42] However, the biggest challenge to Egypt's heretofore dominant position on the Nile is Ethiopia's construction of the GERD. The project is the first ever real challenge to the status quo hitherto sustained by Egyptian hegemony.[43] With a reservoir capable of swallowing the entire 74 BCM annual flow of the Blue Nile river, the GERD is projected to be the largest hydroelectric dam in Africa.[44] When completed, it will generate 6,000 Megawatts of electricity[45], about three times as

[35] *Id*.
[36] Dereje Zeleke Mekonnen, *Declaration of Principles on the Grand Ethiopian Renaissance Dam: Some Issues of Concern*, 11 MIZAN L. REV. 255, 269-71 (2017).
[37] *Id*., at 270.
[38] David Goad, *Water Law Be Dammed?: How Dam Construction by Non-Hegemonic Basin States Places Strain on the Customary Law of Transboundary Watercourses*, 35 AM. U. INT'l L. REV. 907, 909 (2020).
[39] *Id*., at 913.
[40] *Id*., at 930.
[41] Chelkaba, *supra* note 20.
[42] Goad, *supra* note 38, at 913.
[43] Mekonnen, *supra* note 36, at 266-67.
[44] Richards, *supra* note 26, at 15.
[45] *Id*.

much electricity as Egypt's Aswan High Dam.[46] The project's magnitude threatens to undermine Egyptian hegemony on the Nile.[47]

A bitter dispute between Egypt and Ethiopia was inevitable considering the dam's symbolic meaning to Ethiopians who see it as a sign of national reawakening and Egyptian fears about losing what they consider to be their historic right to the Nile waters.[48] The price tag for the GERD project is $4.2 billion.[49] Ethiopia self-financed the entire amount.[50] The project created 12,000 jobs.[51] This all sounds wonderful from the Ethiopian perspective, but from the Egyptian and Sudanese perspectives things look a bit different. Some consider Ethiopia's construction of the GERD as a "significant counter-hegemonic measure".[52] However, Egypt has a lot more to lose than just hegemony. Egypt heavily depends on the Nile for its commercial and domestic water needs.[53] Nearly the entire Egyptian population lives on a tiny strip of cultivatable land on the banks of the Nile river, which is no more than 5.5% of the total Egyptian territory.[54]

The uncanny timing of the GERD project should not be ignored. Months before Ethiopia announced the construction of GERD in 2011, the Arab Spring protests were raging across the Middle East. The protests started when the 26-year old Tunisian street vendor Mohamed Bouazizi, angry at his mistreatment in the hands of a policewoman, doused himself with kerosene and lit

[46] Goad, *supra* note 38, at 913-14.
[47] *Id.*, at 914
[48] Tamar Meshel, *Swimming against the Current: Revisiting the Principles of International Water Law in the Resolution of Fresh Water Disputes*, 61 Harv. Int'l L.J. 135, 138-39 (2020) [hereinafter Meshel, *Swimming against the Current*].
[49] Edna Udobong, *The Rising Conflict on the Nile Waters: Understanding Its Legal, Environmental, and Public Health Consequences*, 10 LIBERTY U. L. REV. 467, 473 (2016).
[50] Mekonnen, *supra* note 36.
[51] Richards, *supra* note 26, at 15.
[52] Mekonnen, *supra* note 36, at 255.
[53] Goad, *supra* note 38, at 933.
[54] Udobong, *supra* note 49, at 472.

himself on fire.[55] The Arab Spring protests reached the Egyptian capital on January 25, 2011.[56] During a national holiday commemorating the police, protesters flooded the streets of Cairo shouting slogans calling for the removal of President Hosni Mubarak.[57] On February 11, 2011, unable to quell the growing anger of the protesters, President Mubarak resigned and handed over power to the Egyptian armed forces.[58] Egyptian protesters would stay on the streets more or less continuously until July 2013.[59] Ethiopia started building the GERD on April 2, 2011, during this chaos in Egypt.[60] Despite Egyptian request to pause the construction, Ethiopia continued building its dam.[61] Ethiopia would have its own democratic protests to deal with beginning in November 2015, which would eventually lead to the resignation of Prime Minister Hailemariam Desalegn.[62] Despite protests and instability in many of its cities and regions,[63] Ethiopia continued working on the dam.

Egypt was intent on preventing the building of the Ethiopian dam.[64] After realizing it could not stop the GERD from being built, Egypt found its way to the negotiating table.[65] In 2015, after seven tripartite meetings, Egypt, Ethiopia and Sudan reached an agreement.[66] This was the 2015

[55] Adeel Hassan, *A Fruit Vendor whose Death Led to a Revolution*, (Dec. 17, 2014), N.Y. Times, https://www.nytimes.com/2014/12/16/us/arab-spring-a-fruit-vendor-who-started-a-revolution.html.
[56] Aljazeera, *Timeline: Egypt's revolution*, (Feb. 14, 2011), https://www.aljazeera.com/news/middleeast/2011/01/201112515334871490.html.
[57] *Id*.
[58] *Id*.
[59] N.Y. Times, *Timeline of Turmoil in Egypt from Mubarak and Morsi to Sisi*, (Jun. 23, 2014), https://archive.nytimes.com/www.nytimes.com/interactive/2013/07/02/world/middleeast/03egypt-timeline-morsi.html#/#time259_7555.
[60] Richards, *supra* note 26, at 15.
[61] *Id*.
[62] Jina Moore, *Ethiopia's Prime Minister Resigns Amid Political Turmoil*, N.Y. Times, (Feb. 15, 2018), https://www.nytimes.com/2018/02/15/world/africa/ethiopia-hailemariam-desalegn.html?auth=login-email&login=email.
[63] Declan Walsh, et al., Ethiopia's *Leader Orders Military Action Against a Northern Region*, N.Y. Times, (Nov. 4, 2020, 9:39 AM), https://www.nytimes.com/2020/11/04/world/africa/ethiopia-abiy-tigray.html.
[64] Mekonnen, *supra* note 36, at 268.
[65] *Id*.
[66] Goad, *supra* note 38, at 915.

Declaration of Principles the UN Security Council mentioned in its press release.[67] The agreement incorporates the basic international water law principle of equitable and reasonable utilization.[68] This agreement is significant because it is the only agreement between Egypt, Ethiopia and Sudan on the Nile issue which recognized the equality of the three states in their rights to utilize the Blue Nile river.[69]

Ethiopia's announcement of the GERD project at the height of the Arab Spring protests was opportunistic to say the least. However, this opportunism is not surprising at all. Over the centuries, the conniving neighbors that they are, Egypt and Ethiopia seem to have perfected the art of catching the other with his trousers down. Because of political mistrust, among many reasons, states sharing freshwater resources often behave in a self-interested manner and show mere coexistence as opposed to cooperation.[70] The obvious fact is: "[the] Nile river basin is defined by the unilateralism of its riparian states and their incompatible claims which negate the fundamentals of international water law."[71] This is, as some call it, the "tinder-box politics characteristic of interstate freshwater disputes".[72]

The Ethiopian government would justify its opportunism merely by pointing to the fact that, before building the dam, despite contributing 86% of the waters of the Nile[73], Ethiopia did not utilize any of its waters, whereas Egypt utilized 85% of the Nile for irrigation.[74] After the first filling of the GERD, Ethiopia impounded about 4.9 BCM[75] out of the annual flow of 84 BCM[76],

[67] *See supra* note 7.
[68] Goad, *supra* note 38, at 915.
[69] *Id*.
[70] Meshel, *Swimming against the Current*, *supra* note 48, at 136-37.
[71] Mekonnen, *supra* note 36, at 255.
[72] Meshel, *Swimming against the Current*, *supra* note 48, at 138.
[73] Chelkaba, *supra* note 20.
[74] Richards, *supra* note 26, at 15.
[75] *See supra* note 18.
[76] Tekuya, *supra* note 19.

which comes to about 5.8% utilization. Even so, however justified Ethiopia may think its building of the GERD is, Egypt does not see the dam as justified. Besides the fact that Egypt sees the GERD project as "an affront to their national security"[77], the disparity in the amount of rainfall Egypt and Ethiopia receive is another reason why Egypt cannot see the project favorably. The mean annual rainfall in the Ethiopian highlands reaches 1,700 mm; in Egypt it is 25 mm.[78] That means Ethiopia receives about 68 times more rainfall per year than Egypt.

It is true, the GERD is a hydroelectric dam, which means its use is non-consumptive and does not involve reduction of water flow.[79] It even has some benefits for Sudan because the reservoir will cut down on flooding.[80] Some of the other benefits of the GERD include water storage in the Ethiopian highlands which has a low evaporation rate, compared to Egypt and Sudan,[81] which would make more water available to all three states. But also true is the fact that, until the dam is filled, there will be a reduction of water flow. Ethiopia has announced its plans to impound more and more water in the next five to seven years to fill the GERD to its maximum capacity of 74 BCM. It has announced it will impound a further 13.5 BCM of water during the July 2021 rainy season.[82]

This thesis focuses on the time period between July 15, 2020, when Sudan announced a significant drop in water levels of the Blue Nile river flowing from Ethiopia,[83] and July 22, 2020, when Ethiopia announced that the first filling of the GERD was achieved.[84]

[77] Richards, *supra* note 26, at 15.
[78] Tekuya, *supra* note 19, at 325.
[79] Mekonnen, *supra* note 36, at 274.
[80] Richards, *supra* note 26, at 15.
[81] *Id.*, at 23.
[82] *See supra* note 3.
[83] *See supra* note 1.
[84] *See supra* note 15.

Part I discusses the development of international water law. This part provides an overview of the evolution of international water law with respect to non-navigable uses of international or transboundary rivers. It shows how the Harmon Doctrine, arguably the earliest principle to govern non-navigable uses, was eventually replaced by the equitable and reasonable utilization principle.

Part II discusses the legal regime in the Blue Nile basin. It discusses the bilateral and multilateral agreements made by various states regarding water use in the basin.

Part III address the issue whether Ethiopia's first filling of the GERD between July 15 and 22, 2020, violated the equitable and reasonable utilization principle. This part concludes that Ethiopia, by not taking into account the existing uses of the Blue Nile river, violated the equitable and reasonable utilization principle.

Part IV discusses whether Ethiopia's violation of the equitable and reasonable utilization principle is an internationally wrongful act. This part examines Ethiopia's violation through the prism of the International Law Commission's Draft Articles on Responsibility of States for Internationally Wrongful Acts (ARSIWA). This part shows Ethiopia's violation of the equitable and reasonable utilization principle is an internationally wrongful act.

Part V shows Egypt and Sudan are entitled to full reparations from Ethiopia for its internationally wrongful act. This part looks at the jurisdiction of the International Court of Justice (ICJ) to address the issue of reparations and ultimately concludes that the ICJ does not have jurisdiction and that the dispute must be resolved by political means.

Part VI draws two important lessons from the Mekong and Indus river basins. In the Mekong case, this part shows the futility of a water treaty made among lower riparian states which do not account for the interests of an upper riparian state. In the Indus case, this part shows, even

when the interests of both upper and lower riparian states are accounted for in a water treaty, there may still be dispute for the simple reason that available water resources are decreasing.

Part VII attempts to address some possible arguments against the main conclusions of this thesis.

I. THE EVOLUTION OF MODERN INTERNATIONAL WATER LAW

There once lived a man named Judson Harmon. He was the attorney general of the United States. In 1895, the U.S. State Department asked Harmon to write a legal opinion articulating the federal government's view on a water dispute with Mexico. The dispute involved Mexico's complaint that the U.S. was diverting the Rio Grande and Colorado rivers.[85] Harmon wrote: "[A] country is absolutely sovereign over the portion of an international watercourse within its borders. Thus, that country would be free to divert all of the water from an international watercourse, leaving none for downstream states."[86] The U.S. would later repudiate this principle by signing the 1944 treaty with Mexico which provided for the sharing of the Rio Grande and Colorado rivers between the two countries.[87]

Harmon's Doctrine that an upstream country can divert all the waters of an international river is what is called the absolute territorial sovereignty principle. This principle holds that a state has an unmitigated control over an international river within its border.[88] A state holding fast to this doctrine does not acknowledge the international status of the portion of a river flowing through its territory. This is often the preferred theory of upstream states.[89]

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[85] *See generally* Stephen C. McCaffrey, *The Harmon Doctrine One Hundred Years Later: Buried, Not Praised*, 36 Nat. Resources J. 549 (1996).
[86] *Id*.
[87] *Id*., at 584.
[88] Goad, *supra* note 38, at 916.
[89] Thomas G. Bode, *A Modern Treaty for the Columbia River*, 47 ENVTL. L. 81, 100 (2017).

Although Judson Harmon was fortunate enough to have lent his name to the principle of absolute territorial sovereignty, Hugo Grotius had taken the same position as far back as 1625. Grotius propounded the notion of absolute territorial sovereignty over natural resources, stating that a river is the property of the people through whose territory it flows, or the ruler under whose sway those people are. This notion has lost significance today.[90] This is obvious for the fact that a nation's sovereignty over its natural resources is not unlimited[91]. Grotius's view and the Harmon doctrine are now "archaic positions and are not considered a part of contemporary international law."[92]

The principle that is much preferred by downstream states is what is called the absolute territorial integrity principle. This principle holds that a state has a right to a natural flow of a river and that an upstream state may not impede or change that flow.[93] This doctrine which guarantees a lower riparian state the continuous natural flow of a river from an upper riparian state has also fallen out of favor.[94]

The history of international water law vacillated between these two incompatible principles.[95] The absolute territorial sovereignty and absolute territorial integrity doctrines were not aligned with the principles of equity and justice.[96] Since the mid-nineteenth century, states increasingly accepted some restrictions on the absolute territorial sovereignty principle, especially

[90] *See generally* Anasuya Syam & Sushma Sosha Philip, *Investigating Interlinking: A Critique of India's National River Linking Plan*, 5 ENVTL. L. & PRAC. REV. 1, 10 (2016-2017).
[91] Anatole Boute, *The Water-Energy-Climate Nexus under International Law; A Central Asian Perspective*, 5 MICH. J. ENVTL. & ADMIN. L. 371, 400 (2016).
[92] Syam, *supra* note 90, at 11.
[93] Bode, *supra* note 89.
[94] Syam, *supra* note 90, at 11.
[95] Bode, *supra* note 89.
[96] Waseem Ahmad Qureshi, *Equitable Apportionment of Shared Transboundary River Waters: A Case Study of Modifications of the Indus Waters Treaty*, 18 San DIEGO INT'l L.J. 199, 206 (2017) [hereinafter Qureshi, *Equitable Apportionment*].

the restriction on harm done to other states by one state without the other state's prior consent.[97] This is, of course, excepting the American position in the late nineteenth century as set out in Harmon's legal opinion.[98]

Present-day international water law threads a middle course between the two extremes of absolute territorial sovereignty and absolute territorial integrity.[99] It is now the accepted custom that states cannot use water unilaterally to the detriment of other riparian states' equitable rights to the same.[100]

International water law is now largely based on the limited territorial sovereignty theory.[101] The limited territorial sovereignty theory lies midway between the two extremes of absolute territorial sovereignty and absolute territorial integrity.[102] It balances a state's right to use rivers flowing through its sovereign territory against its obligations not to cause significant harm to other states.[103] Limited territorial sovereignty serves as a mutual limitation of sovereign rights.[104]

Limited territorial sovereignty has two core principles which are generally viewed as having customary law status, namely the equitable and reasonable utilization principle and the no significant harm principle.[105]

Equitable and reasonable utilization is the foundational principle of modern international water law.[106] Underlying the principle is the assumption that "all countries are sovereign nations

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[97] Elizabeth Holden, *Applying New International Principles of Transboundary Water Allocation to Florida v. Georgia's Doctrine of Equitable Apportionment*, 52 VAND. J. Transnat'l L. 1097, 1104-5 (2019).
[98] *See generally* McCaffrey, *supra* note 85.
[99] Bode, *supra* note 89, at 100-101.
[100] Stephanie Biggs, *Water Management on the Brahmaputra and the Applicability of the UNECE Water Convention*, 51 VAND. J. Transnat'l L. 555, 563 (2018).
[101] Tamar Meshel, *The Evolution of Interstate Arbitration and the Peaceful Resolution of Transboundary Freshwater Disputes*, 2016 J. Disp. Resol. 361, 365 (2016) [hereinafter Meshel, *Freshwater Disputes*].
[102] *Id*.
[103] Bode, *supra* note 89, at 100-101.
[104] Meshel, *Freshwater Disputes*, *supra* note 101.
[105] Meshel, *Swimming against the Current*, *supra* note 48, at 148.
[106] Sharmila L. Murthy & Fatima Mendikulova, *Water, Conflict, and Cooperation in Central Asia: The Role of International Law and Diplomacy*, 18 VT. J. ENVTL. L. 400, 407 (2017).

that rest on equal footing in relation to one another."[107] However, sovereign equality does not mean each state has a right to an equal amount of water nor an equal amount of benefits from the water.[108] The equitable and reasonable utilization principle allows for limited sovereignty whereby each riparian state has the right to use the resource and the duty to manage the same in a way that avoids interference with the uses of other states.[109]

The other core principle of limited territorial sovereignty is the no significant harm principle. This principle is rooted in the Latin maxim *sic utere tuo ut alienum non laeda*, which prohibits states from using their territory in a way that causes harm to another state.[110] That is, a state may not claim to use the waters flowing through its territory in such a way as to cause material injury to the interests of another state, or to oppose their use by another state unless such use causes material injury to itself.[111] The no significant harm principle is also a principle of good neighborliness.[112] This principle requires a state to ensure that its use causing significant harm is equitable and reasonable.[113] The no significant harm principle is not an absolute prohibition on the causing of harm to other riparian states. In fact, the principle allows the causing of factual harm if such harm is equitable under the circumstances.[114] The prevailing view among scholars is that the no significant harm principle is subordinated to the equitable and reasonable utilization principle.[115]

[107] Goad, *supra* note 38, at 919.
[108] Murthy, *supra* note 106, at 408-409.
[109] Sahana Rao, *Governance of Water Resources Shared by India and Pakistan under the Indus Waters Treaty: Successful Elements and Room for Improvement*, 25 N.Y.U. ENVTL. L.J. 108, 113 (2017).
[110] Meshel, *Swimming against the Current*, *supra* note 48, at 149.
[111] *Id*., at 149-50.
[112] Murthy, *supra* note 106, at 410.
[113] Meshel, *Swimming against the Current*, *supra* note 48, at 156.
[114] O. W. Bussey, *In Good Times and in Bad: An International Water Law Analysis of Minute 323*, 31 GEO. ENVTL. L. REV. 157,177-78 (2018).
[115] Murthy, *supra* note 106, at 411.

It took the greater part of half a century for international water law to evolve from the Harmon Doctrine to the equitable and reasonable utilization principle. Soon after Judson Harmon issued his opinion, states realized cooperation was better than the absolute sovereignty approach to resolve freshwater disputes.[116]

First mention of cooperation on water issues appeared in the Institute of International Law's (IIL) 1911 Madrid Declaration[117]. The declaration recognized the mutual consent of riparian states as a basis for watercourse use.[118] In its statement of reasons, the declaration acknowledged the interdependence of states sharing a watercourse: "Riparian States with a common stream are in a position of permanent physical dependence on each other which precludes the idea of the complete autonomy of each State in the section of the natural watercourse under its sovereignty."[119] Among the rules the Madrid Declaration set out, article II(3) is notable for its specificity. It provides: "When a stream traverses successively the territories of two or more States, [n]o establishment (especially factories utilizing hydraulic power) may take so much water that the constitution, otherwise called the utilizable or essential character of the stream shall, when it reaches the territory downstream, be seriously modified."[120] Article II(3) limited the amount of water an upstream state may withdraw from the common stream to that amount which would not seriously modify the stream's utilizable or essential character when it reaches the downstream states. The

[116] *See generally* Tamar Meshel, *Unmasking the Substance behind the Process: Why the Duty to Cooperate in International Water Law is Really a Substantive Principle*, 47 DENV. J. INT'l L. & POL'y 29, 34 (2018) [hereinafter Meshel, *Duty to Cooperate*].
[117] Inst. Int'l Law, *International Regulation regarding the Use of International Watercourses for Purposes Other Than Navigation - Declaration of Madrid* (Apr. 20, 1911) [hereinafter Madrid Declaration].
[118] Zewei Yang, *United Nations Convention on the Law of the Non-Navigational Uses of International Watercourses: Problems, Improvements and Potential Influence on China*, 47 HONG KONG L.J. 243, 252 (2017).
[119] Madrid Declaration, *supra* note 117, Statement of Reasons.
[120] *Id*., art. II(3). Parenthesis is in the original text.

declaration extended this principle to "cases where streams flow from a lake situated in one State, through the territory of another State, or the territories of other States."[121]

Following the First World War, international organizations started prioritizing multilateral water sharing treaties for non-navigational uses over navigational ones. In 1923, several European and Latin American states came together to sign the Hydraulic Power Convention.[122] The convention outlined the water rights of co-riparian states, and obliged signatory states to assess the interests of co-riparian states when devising water usage components.[123] It also established rules intended to promote "international agreement for the purpose of facilitating the exploitation and increasing the yield of hydraulic power."[124] Article 1 acknowledged a state's right to develop the water resources within its territory: "The present Convention in no way affects the right belonging to each State, within the limits of international law, to carry out on its own territory any operations for the development of hydraulic power which it may consider desirable."[125] Article 4 imposed on states the obligation of negotiation: "If a Contracting State desires to carry out operations for the development of hydraulic power which might cause serious prejudice to any other Contracting State, the States concerned shall enter into negotiations with a view to the conclusion of agreements which will allow such operations to be executed."[126] The sort of agreements contemplated by article 4 include those which would provide for the regulation of water flow.[127]

The differences between the rights and obligations set out in the 1911 Madrid Declaration and the 1923 Hydraulic Power Convention are obvious: First, the 1923 convention recognized a

[121] *Id*., art. II(6).
[122] *Convention Relating to the Development of Hydraulic Power Affecting More Than One State and Protocol of Signature – Geneva* (Dec. 9, 1923) [hereinafter Hydraulic Power Convention].
[123] Waseem Ahmad Qureshi, *The IWT and the UNWC: Commonalities and Differences*, 23 OCEAN & Coastal L.J. 87, 104 (2018) [hereinafter Qureshi, *IWT and UNWC*].
[124] Hydraulic Power Convention, *supra* note 122, preamble.
[125] *Id*., art. 1.
[126] *Id*., art. 4.
[127] *Id*., art. 6(f).

state's right, within the limits of international law, to develop the water resources within its own territory,[128] a right the 1911 Madrid Declaration did not explicitly recognize.[129] In fact, the Madrid Declaration went as far as to say that the permanent physical dependence of riparian states "precludes the idea of complete autonomy of each state in the section of the natural watercourse under its sovereignty."[130] Second, the 1923 convention imposed on states which desire to develop hydraulic power which might cause serious prejudice to other states, the obligation to negotiate with those states and reach an agreement concerning the regulation of water flow.[131] There was no such obligation under the 1911 Madrid Declaration.[132]

The IIL's 1961 Salzburg Resolution[133] reiterated the 1923 Hydraulic Power Convention's position on a state's right, within the limits of international law, to develop the water resources within its territory. Article II provided:

> Every State has the right to make use of the waters flowing across or bordering its territory subject to the limitations imposed by international law and in particular those which result from the following legal dispositions. That right is limited by the right of use by other States concerned with the same river or watershed.[134]

Article III introduced the principle of equity: "If the various States disagree upon the extent of their rights of use, the disagreement shall be settled on the basis of equity, taking into consideration the respective needs of the States, as well as any other circumstances relevant to any particular case."[135]

The glaring difference between the 1961 Salzburg Resolution on one hand, and the 1911 Madrid Declaration and the 1923 Hydraulic Power Convention on the other, is that the Salzburg

[128] *Id*., art. 1.
[129] Madrid Declaration, *supra* note 117.
[130] *Id*., preamble.
[131] *See supra* notes 126 and 127.
[132] Madrid Declaration, *supra* note 117.
[133] Inst. Int'l. Law, *Resolution on the Use of International Non-Maritime Waters – Resolution of Salzburg* (Sep. 11, 1961) [hereinafter Salzburg Resolution].
[134] *Id*., art. II.
[135] *Id*., art. III.

Resolution practically gives downstream states veto power on projects in upstream states. According to article VI, if objections were raised against such projects, "the State shall enter in negotiations in view of reaching an agreement within a reasonable time."[136] The obligation to enter into negotiations was reinforced by article VII which states: "During the negotiations, every State should, according to the principle of good faith, refrain from proceeding with the works or uses in dispute, or from taking any other measures likely to aggravate the conflict or to make a settlement more difficult."[137]

From the 1911 Madrid Declaration, through the 1923 Hydraulic Power Convention, to the 1961 Salzburg Resolution, two interrelated principles emerged. The first principle to emerge was that within the limits of international law each state had the right to develop the water resources within its territory. The second principle to emerge was that each state had some responsibility to desist from harming its downstream neighbors. The notion embodied by the Harmon Doctrine seems all but forgotten by the time of the Salzburg Resolution.

In 1966, the International Law Association (ILA) drafted the Helsinki Rules.[138] The Helsinki Rules provided the traditional exposition of the equitable and reasonable utilization principle.[139] The rules combined a state's right to develop the water resources in its territory with its responsibility to desist from harming its downstream neighbors and codified them as the equitable and reasonable utilization principle: "Each basin State is entitled, within its territory, to a reasonable and equitable share in the beneficial uses of the waters of an international drainage

[136] *Id*., art. VI.
[137] *Id*., art. VII.
[138] Int'l. Law Ass'n, *Helsinki Rules on the Uses of Waters of International Rivers* (August 1966) [hereinafter Helsinki Rules].
[139] Syam, *supra* note 90, at 12.

basin."[140] The rules also set out a non-exhaustive list of factors to be considered to determine whether a particular use is equitable and reasonable.[141]

The Helsinki Rules were the foundation upon which a holistic legal framework to govern international watercourses was developed.[142] The rules ushered in the era of modern international water law.[143] This was possible because the ILA developed the Helsinki Rules for navigational as well as non-navigational uses of water resources after a judicious and empirical evaluation of prevailing state practices with respect to water apportionment.[144] This effort was meant to establish rules for the reasonable sharing and management of water resources among co-riparian states.[145]

In 1970, the UN General Assembly requested a study on the law of international watercourses.[146] Two conventions followed: the 1992 UN Water Convention[147] and the 1997 UN Watercourses Convention.[148] There is not much that needs to be said here about the 1992 UN Water Convention as its focus was on the environmental protection of transboundary rivers instead of their utilization.[149] However, the convention reaffirmed the equitable and reasonable utilization principle by requiring states to take all appropriate measures "to ensure that transboundary waters are used in a reasonable and equitable way."[150] The 1997 UN Watercourses Convention attempted to fill in the remaining gap in the legal framework governing international watercourses.[151] The

[140] Helsinki Rules, *supra* note 138, art. IV.
[141] *Id*., art. V.
[142] Goad, *supra* note 38, at 917.
[143] *See* Mike Pease & Olen Paul Matthews, *Borderless Commons under Attack: Reconciling Recent Supreme Court Decisions with Watershed Scale Management*, 9 Seattle J. ENVTL. L. 83,100 (2019).
[144] Qureshi, *IWT and UNWC*, *supra* note 123, at 105.
[145] *Id*.
[146] Goad, *supra* note 38, at 918.
[147] Convention on the Protection and Use of Transboundary Watercourses and International Lakes, Helsinki, Mar. 17, 1992, 1936 U.N.T.S. 269 [hereinafter 1992 UN Water Convention].
[148] Convention on the Law of the Non-Navigational Uses of International Watercourses, May 21, 1997, 36 I.L.M. 700 [hereinafter Watercourses Convention].
[149] 1992 UN Water Convention, art. 2(1) and 1(2).
[150] *Id*., art. 2(2)(c).
[151] Qureshi, *IWT and UNWC*, *supra* note 123, at 100.

convention is the main UN instrument that codifies the equitable and reasonable utilization principle in present-day international water law.[152] The Watercourses Convention aimed at aiding the negotiation and interpretation of existing bilateral and multilateral treaties, not supplanting them.[153]

By the time the Watercourses Convention codified the equitable and reasonable utilization and no significant harm principles, those principles had already attained the status of existing customary international law.[154] The convention codified the two principles separately. In Article 5(1), the convention stated, in relevant parts: "Watercourse States shall in their respective territories utilize an international watercourse in an equitable and reasonable manner."[155] And in article 7(1), it stated that "Watercourse States shall, in utilizing an international watercourse in their territories, take all appropriate measures to prevent the causing of significant harm to other watercourse States."[156] The convention reflected the equitable and reasonable utilization as the leading principle in international water law.[157] Although the convention codified the equitable and reasonable utilization and no significant harm principles separately, the language used in the convention reflects the subordination of the no significant harm principle to the equitable and reasonable utilization principle.[158]

The 1997 UN Watercourses Convention entered into force only in 2014.[159] The fact that only 16 states signed the convention when it was open for signature and that it took more than 17 years for its entry into force is indicative of the international community's dissatisfaction with it.[160]

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[152] Meshel, *Swimming against the Current*, *supra* note 48, at 150.
[153] Murthy, *supra* note 106.
[154] Yang, *supra* note 118, at 253.
[155] Watercourses Convention, art. 5(1).
[156] *Id*., art. 7(1).
[157] Meshel, *Swimming against the Current*, supra note 48, at 140.
[158] Yang, *supra* note 118, at 250.
[159] Chelkaba, *supra* note 20, at 166.
[160] Yang, *supra* note 118, at 245.

Because the convention was taking such a longtime to enter into force, in 2004, the ILA convened in Berlin to synthesize customary international water law.[161] The result was the Berlin Rules[162]. The Berlin Rules were intended to set out the latest principles governing all aspects of freshwater resources.[163]

The Berlin Rules superseded the 1966 Helsinki Rules.[164] However, the rules kept intact the equitable and reasonable utilization principle, along with its factors. The latest formulation of the equitable and reasonable utilization principle as set out in article 12 of the Berlin Rules provides:

> 1. Basin States shall in their respective territories manage the waters of an international drainage basin in an equitable and reasonable manner having due regard for the obligation not to cause significant harm to other basin States.
>
> 2. In particular, basin States shall develop and use the waters of the basin in order to attain the optimal and sustainable use thereof and benefits therefrom, taking into account the interests of other basin States, consistent with adequate protection of the waters.[165]

The Berlin Rules also set out a list of non-exhaustive factors to be used to determine equitable and reasonable utilization. Article 13 provides:

> 1. Equitable and reasonable use within the meaning of Article 12 is to be determined through consideration of all relevant factors in each particular case.
>
> 2. Relevant factors to be considered include, but are not limited to:
>
> a. Geographic, hydrographic, hydrological, hydrogeological, climatic, ecological, and other natural features;
>
> b. The social and economic needs of the basin States concerned;
>
> c. The population dependent on the waters of the international drainage basin in each basin State;
>
> d. The effects of the use or uses of the waters of the international drainage basin in one basin State upon other basin States;
>
> e. Existing and potential uses of the waters of the international drainage basin;
>
> f. Conservation, protection, development, and economy of use of the water resources of the international drainage basin and the costs of measures taken to achieve these purposes;

[161] Goad, *supra* note 38, at 918.
[162] Int'l. Law Association Berlin Conference (2004), Water Resources Law, Berlin Rules on Water Resources [hereinafter Berlin Rules].
[163] Qureshi, *IWT and UNWC*, *supra* note 123, at 106.
[164] *Syam*, supra note 90, at 12.
[165] Berlin Rules, *supra* note 162, art. 12.

> g. The availability of alternatives, of comparable value, to the particular planned or existing use;
>
> h. The sustainability of proposed or existing uses; and
>
> i. The minimization of environmental harm.
>
> 3. The weight of each factor is to be determined by its importance in comparison with other relevant factors. In determining what is a reasonable and equitable use, all relevant factors are to be considered together and a conclusion reached on the basis of the whole. [166]

II. THE LEGAL REGIME IN THE BLUE NILE BASIN

The 1966 Helsinki Rules defined an international drainage basin as "a geographical area extending over two or more States determined by the watershed limits of the system of waters, including surface and underground waters, flowing into a common terminus."[167] The 1997 Watercourses Convention defined an international watercourse as "a watercourse parts of which are situated in different States."[168] The 2004 Berlin Rules defined an international drainage basin as "a drainage basin extending over two or more States."[169] The Blue Nile river flows from Ethiopia, passes through Sudan and Egypt, and terminates in the Mediterranean Sea. By any accepted definition of the term, it is an international river governed by international law.

The 2015 GERD Agreement

International agreements, state practice and judicial decisions show the wide acceptance of the equitable and reasonable utilization principle.[170] The legal regime in the Blue Nile basin is no different. Although the three basin states took their time in accepting the prevailing equitable and reasonable utilization principle, there is now an agreement among them that utilization should be based on that principle. In 2015, Egypt, Ethiopia and Sudan concluded the 2015 GERD

[166] *Id*., art. 13.
[167] Helsinki Rules, *supra* note 138, art. II.
[168] Watercourses Convention, *supra* note 148, art. 2(b).
[169] Berlin Rules, *supra* note 162, art. 3(13).
[170] Chelkaba, *supra* note 20, at 177.

Agreement.[171] This is the only agreement all three Blue Nile basin states signed on the Nile waters issue.

The GERD Agreement relies on the equitable and reasonable utilization principle as an allocation strategy.[172] It can be discerned from the agreement's language that it borrowed a great deal from the equitable and reasonable utilization factors set out in the Berlin Rules.[173] Principle IV provides:

> The three countries shall utilize their shared water resources in their respective territories in an equitable and reasonable manner.
>
> In ensuring their equitable and reasonable utilization, the three countries will take into account all the relevant guiding factors listed below, but not limited to the following outlined:
>
> a. Geographic, hydrographic, hydrological, climatic, ecological and other factors of a natural character;
>
> b. The social and economic needs of the Basin States concerned;
>
> c. The population dependent on the water resources in each Basin State;
>
> d. The effects of the use or uses of the water resources in one Basin State on other Basin States;
>
> e. Existing and potential uses of the water resources;
>
> f. Conservation, protection, development and economy of use of the water resources and the costs of measures taken to that effect;
>
> g. The availability of alternatives, of comparable value, to a particular planned or existing use;
>
> h. The contribution of each Basin State to the waters of the Nile River system;
>
> i. The extent and proportion of the drainage area in the territory of each Basin State.[174]

Even without the GERD Agreement, the equitable and reasonable utilization principle would apply to the Blue Nile river as customary international law.[175] Although the Berlin Rules

[171] Agreement on Declaration of Principles between the Arab Republic of Egypt, the Federal Democratic Republic of Ethiopia and the Republic of Sudan on the Grand Ethiopian Renaissance Dam Project (GERDP), Khartoum, Sudan, Mar. 23, 2015 [hereinafter GERD Agreement].
[172] Tekuya, *supra* note 19, at 342.
[173] *See* Berlin Rules, *supra* note 166.
[174] GERD Agreement, *supra* note 171, principle IV.
[175] David J. Devlaeminck, *The Legal Principle of Reciprocity in the Peaceful Management of Transboundary Watercourses: The Duty to Cooperate, Rules of Procedure and Self-Help Measures*, 59 NAT. Resources J. 301, 302 (2019).

setting out the latest version of the principle have customary law status, for the purpose of the present dispute, the GERD Agreement's formulation of the principle is preferred.

Before the 2015 agreement, there was no inclination among Egypt, Ethiopia and Sudan to collectively accept the equitable and reasonable utilization principle. This can be read from Egypt's and Ethiopia's refusal to sign the 1997 UN Watercourses Convention which codified the equitable and reasonable utilization principle.[176] Furthermore, their diversion from the global trend is discernable in the several agreements predating the 2015 GERD Agreement.

Pre-GERD Agreements

In the years before the 2015 GERD Agreement, states with various interests in the Nile waters, some not even situated in the Nile river basin, concluded several seemingly incompatible agreements. This inevitably led to "fragmented legal regimes"[177]. These are agreements concluded in 1891, 1902, 1929, 1959, 1993, and 2010. The first four agreements preceded the first codification of the equitable and reasonable utilization principle in the 1966 Helsinki Rules.[178] The last agreement was concluded after the equitable and reasonable utilization principle was codified for the second time in the 1997 UN Watercourses Convention[179] but before the convention's entry into force in 2014[180].

In 1891, anticipating its own sphere of influence in East Africa, Italy signed a protocol with Britain agreeing not to build dams on the Nile river or use its waters for irrigation.[181] However, Ethiopian victory over Italy in 1896 gave Ethiopia "standing to reject the Protocol signed by Italy

[176] *See* Tamar Meshel, *Swimming against the Current*, *supra* note 48, at 180.
[177] Tekuya, *supra* note 19, at 322.
[178] *See* Helsinki Rules, *supra* note 138.
[179] *See* Watercourses Convention, *supra* note 148.
[180] *See supra* note 159.
[181] *See* Protocol for the Demarcation of Their Respective Spheres of Influence in East Africa From Ras Kasar to the Blue Nile (Gr. Brit-Italy), Apr. 15, 1891, art. III.

on its behalf."[182] Another agreement Ethiopia would end up rejecting is the 1902 treaty[183]. Unlike the 1891 treaty which Italy on its own accord signed on Ethiopia's behalf, Ethiopia itself signed the 1902 treaty with the United Kingdom. This treaty concerned boundary arrangements between British and Italian colonies in the East African region and Ethiopia. This agreement contained a provision that required Ethiopia to obtain permission from the British government before constructing any work across the Blue Nile which would arrest its flow. Article III stated:

> His Majesty the Emperor Menelek II, King of Kings of Ethiopia, engages himself towards the Government of His Britannic Majesty not to construct, or allow to be constructed, any work across the Blue Nile, Lake Tsana, or the Sobat which would arrest the flow of their waters into the Nile except in agreement with His Britannic Majesty's Government and the Government of the Soudan [*sic*].[184]

As independent sovereigns, the United Kingdom's and Ethiopia's status as parties to the 1902 agreement is clear. What is not so clear is the status of Egypt and Sudan with respect to the agreement. Egypt was not mentioned in the agreement but Sudan was. All the same, at the time the agreement was concluded, both were under British rule.[185] According to the law of state succession codified in the Vienna Convention on Succession of States in respect of Treaties[186] (VCSST), a newly independent state may not establish its status as a party to any multilateral treaty if the consent of all the parties is required.[187] Conveniently enough, Egypt, Sudan and Ethiopia have all signed the VCSST: Ethiopia and Sudan signed the convention on August 23, 1978, Ethiopia ratifying the VCSST on May 28, 1980. Egypt acceded to the VCSST on July 17, 1986.

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[182] Udobong, *supra* note 49, at 478.
[183] Treaties between the United Kingdom and Ethiopia, and between the United Kingdom, Italy, and Ethiopia, Relative to the Frontiers Between the Soudan, Ethiopia and Eritrea, Treaty Series No. 16, Addis Ababa, May 15, 1902 [hereinafter 1902 UK-Ethiopia Treaty].
[184] *Id*., art. III.
[185] *See* M. L. Marasinghe, *Policies, Purpose and Aims of Reception Statutes in British Colonial Africa*, 12 E. AFR. L.J. 1, 19-21 (1976).
[186] UN General Assembly, *Vienna Convention on Succession of States in respect of Treaties*, Nov. 6, 1996 [hereinafter VCSST]. For status of ratification (Sep. 11, 2020, 05:02 AM), *see* https://treaties.un.org/Pages/ViewDetails.aspx?src=IND&mtdsg_no=XXIII-2&chapter=23&clang=_en.
[187] *Id*., art. 17(3).

None of them made any reservations to the convention. The VCSST entered into force on November 6, 1996.[188]

According to the VCSST, when Egypt and Sudan gained their independence from Britain, as newly independent states they could have established their status as parties to the 1902 treaty by giving a notification of succession to the original parties to the treaty – the United Kingdom and Ethiopia.[189] Moreover, because the 1902 treaty required the consent of the UK and Ethiopia, the newly independent states of Egypt and Sudan could not have succeeded Britain to establish their status as parties to the treaty without Ethiopia's consent.[190] This was not possible for Egypt and Sudan to do because on September 11, 1952, Ethiopia declared the 1902 treaty null and void.[191]

Then came the 1929 agreement between the United Kingdom and Egypt[192]. By 1929, Britain had added Kenya, Sudan, Tanzania, and Uganda to her list of colonies which had previously included Egypt and Sudan.[193] Some consider the 1929 agreement as "yet another attempt by the British to secure the Nile's flow to Egypt, after Britain's failure to control Lake Tana".[194] The agreement was concerned with the use of the Nile waters for irrigation.[195] The agreement allocated 57% of the Nile's waters to Egypt.[196] Without naming any names, it also demanded that any projects by upstream states that might alter the flow of the Nile be approved

[188] *See supra* note 186.
[189] VCSST, *supra* note 186, 17(1).
[190] *Id*., 17(3).
[191] *Decision Regarding Delimitation of the Border between the State of Eritrea and the Federal Democratic Republic of Ethiopia*, Eritrea-Ethiopia Boundary Commission, at 12, (Apr. 13, 2002).
[192] Exchange of Notes Between His Majesty's Government in the United Kingdom and the Egyptian Government in Regard to the Use of Waters of the River Nile for Irrigation Purposes, U.K.-Egypt, May 7, 1929, 93 L.N.T.S. 44 [hereinafter 1929 Agreement].
[193] *See* Udobong, *supra* note 49, at 481.
[194] *Id*., at 467.
[195] *See* 1929 Agreement, *supra* note 192.
[196] Goad, *supra* note 38, at 914.

by Egypt.[197] The 1929 agreement provides no explanation as to the origin and content of such rights for Egypt on the waters of the Nile.[198]

Customary law is one of the sources of international law.[199] According to the customary law of treaties codified in the Vienna Convention on the Law of Treaties[200] (VCLT), the parties to the 1929 agreement must perform it in good faith.[201] Ethiopia did not consent to be bound by the agreement and is therefore not bound by it.[202] Parenthetically, the VCLT is being used here and throughout this paper in a manner that is consistent with the International Court's usage. The rules for treaty interpretation set out in the VCLT are used even for those treaties that preceded the VCLT.[203]

Sudan was resentful about the 1929 agreement and after independence, it reached a new agreement with Egypt.[204] Sudan considered the 1929 agreement invalid for the simple reason that, though it was named in the agreement, it was not a party to it.[205] The new agreement between Sudan and Egypt was the 1959 agreement[206]. This agreement sought to secure the existing hegemony enjoyed by Egypt over the Nile by raising Egypt's share of the waters to 66% of the Nile's total flow.[207]

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[197] *Id*.
[198] Andreas K. Wendl, *International Water Rights on the White Nile of the New State of South Sudan*, 39 B. C. INT'l & COMP. L. REV. 1, 11 (2016).
[199] United Nations, *Statute of the International Court of Justice*, 18 April 1946 [hereinafter ICJ Statute], art. 38(1)(b).
ICJ Statute, art. 38(1)(b).
[200] United Nations, *Vienna Convention on the Law of Treaties*, 23 May 1969, Treaty Series, vol. 1155, p. 331 [hereinafter VCLT].
[201] *Id*., art. 26.
[202] *Id*., art. 2(1)(g).
[203] *See Pulp Mills*, *infra* note 272, at para. 65.
[204] *See supra* note 198, at 11-12.
[205] *Id*.
[206] Agreement Between the Republic of the Sudan and the United Arab Republic for the Full Utilization of the Nile Waters, Sudan-United Arab Republic, Nov. 8, 1959, 453 U.N.T.S. 51 [hereinafter 1959 Agreement].
[207] *See supra* note 196.

According to its preamble, the reason for the 1959 agreement was because the 1929 agreement did not allow the complete control of the Nile River by Egypt and Sudan: "as the Nile waters Agreement concluded in 1929 provided only for the partial use of the Nile waters and did not extend to include a complete control of the River waters, the two Republics have agreed on the following. . . ."[208] The agreement outlined the acquired rights of Egypt and Sudan as 48 BCM and 4 BCM of the Nile waters, respectively.[209] In what one scholar dubbed "a staggering dismissal of third-party rights"[210], the 1959 Agreement provided for the Nile River's "full control and for increasing its yield for the full utilization of its waters by the Republic of the Sudan and the United Arab Republic" and the need to reach "full agreement and co-operation between the two Republics in order to regulate their benefits and utilize the Nile waters in a manner which secures the present and future requirements of the two countries".[211] The United Arab Republic was a joint entity formed by the union of Egypt and Syria in 1958.[212] The union had lasted until 1961.[213] The 1959 agreement says nothing about how Syria was to be provided with the Nile waters.

The 1959 agreement divided the entire flow of the Nile between Egypt and Sudan, ignoring any potential demand by the states which supply the water.[214] Article II, paragraph 4 divided the full Nile waters between Egypt and Sudan, designating 55.5 BCM for Egypt and 18.5 BCM for Sudan.[215] The agreement even envisaged "perpetual applicability" which does not allow for termination by either Egypt or Sudan, the only parties to the agreement.[216] At any rate, the 1959

[208] 1959 Agreement, *supra* note 206, preamble.
[209] *Id*., art. 1 and 2.
[210] Philip A. Williams, *Peace like a River: Institutionalizing Cooperation over Water Resources in the Jordan River Basin*, 28 COLO. NAT. Resources ENERGY & ENVTL. L. REV. 313, 342 (2017).
[211] *See supra* note 208.
[212] Bachar Hakim, *Syrian War - The Historical Context*, 1 J. Rts. & Just. 56, 58 (2020).
[213] *Id*.
[214] Richards, *supra* note 26, at 16.
[215] 1959 Agreement, *supra* note 206, art. II.
[216] Tekuya, *supra* note 19, at 333.

agreement is not binding upon Ethiopia for the same reason the 1929 agreement is not binding upon it: Ethiopia did not consent to be bound by the agreement.[217]

The 1959 agreement created a set of rights and obligations between Egypt and Sudan and nobody else.[218] When concluding the 1959 agreement, Egypt and Sudan "did not even consult Ethiopia, the source of the vast majority of the Nile's water."[219] However, Egypt and Sudan consider their rights under the 1929 and 1959 agreements as non-negotiable.[220] The Egyptian government went as far as enshrining what it considers are its historic water rights in Egypt's new constitution adopted in 2013.[221] Most of the Nile riparian states, with the understandable exception of Egypt, vehemently oppose recognition of the 1929 and 1959 agreements which essentially ensure an Egyptian veto power on all water projects on the Nile.[222] A "right of assent" or a "right of veto" could paralyze a state's exercise of its territorial jurisdiction.[223]

For a time, the upstream nations tolerated the 1959 agreement mainly because of the fact that they had other water resources, while Sudan and Egypt were arid places.[224] But soon enough, several Nile basin states came together to negotiate an agreement which would replace the 1929 and 1959 agreements.[225] To the nine Nile basin states, the two agreements meant an inequitable allocation of the Nile waters.[226] In 1995, Nile basin states' opposition to the 1929 and 1959 arrangements led to the creation of the Basin Action Plan (BAP).[227] The plan's purpose was to

[217] *See supra* note 202.
[218] Wendl, *supra* note 198, at 12.
[219] Richards, *supra* note 26, at 14.
[220] Mekonnen, *supra* note 36, at 258.
[221] Tamar Meshel, *Swimming against the Current*, *supra* note 48, at 138-39.
[222] Wendl, *supra* note 198, at 41.
[223] Boute, *supra* note 91, at 399-400.
[224] Richards, *supra* note 26, at 16.
[225] Chelkaba, *supra* note 20, at 167.
[226] *See supra* note 222, at 10.
[227] Williams, *supra* note 210, at 341.

establish a basin-wide legal framework.[228] In 1999, the BAP lead to the creation of the Nile Basin Initiative (NBI).[229] The NBI aimed at correcting the unreasonableness of the 1929 and 1959 agreements.[230] This effort would eventually culminate in an agreement in 2010.[231]

The 2010 Nile Basin Agreement[232] was modeled after the 1997 UN Watercourses Convention.[233] The agreement relies on the equitable and reasonable utilization principle as an allocation strategy.[234] Article 4(1) provides, in relevant parts: "Nile Basin States shall in their respective territories utilize the water resources of the Nile River System in an equitable and reasonable manner."[235] Article 4(2) lists the factors that must be taken into account to ensure equitable and reasonable utilization:

> (a) Geographic, hydrographic, hydrological, climatic, ecological and other factors of a natural character;
>
> (b) The social and economic needs of the Basin States concerned;
>
> (c) The population dependent on the water resources in each Basin State;
>
> (d) The effects of the use or uses of the water resources in one Basin State on other Basin States;
>
> (e) Existing and potential uses of the water resources;
>
> (f) Conservation, protection, development and economy of use of the water resources and the costs of measures taken to that effect;
>
> (g) The availability of alternatives, of comparable value, to a particular planned or existing use;
>
> (h) The contribution of each Basin State to the waters of the Nile River system;
>
> (i) The extent and proportion of the drainage area in the territory of each Basin State.[236]

[228] Richards, *supra* note 26, at 17.
[229] *Id*.
[230] *Id*.
[231] Williams, *supra* note 210, at 341.
[232] Agreement on the Nile River Basin Cooperative Framework, May 14, 2010 [hereinafter 2010 Nile Basin Agreement].
[233] Williams, *supra* note 210, at 341.
[234] Tekuya, *supra* note 19, at 335.
[235] 2010 Nile Basin Agreement, *supra* note 232, art. 4(1).
[236] *Id*., art. 4(2).

Six Nile riparian states signed the 2010 Nile Basin Agreement, namely Ethiopia, Rwanda, Tanzania, Uganda, Kenya, and Burundi.[237] Ethiopia, Rwanda and Tanzania have ratified the agreement.[238] Egypt and Sudan were conspicuously absent at the signing of the 2010 agreement. Egypt refused to sign the agreement because it saw it as a "counter-hegemonic device"[239].

Under customary treaty law codified in the VCLT, there are times when "third states" which are not parties to an agreement may have some rights under an agreement:

> A right arises for a third State from a provision of a treaty if the parties to the treaty intend the provision to accord that right either to the third State, or to a group of States to which it belongs, or to all States, and the third State assents thereto. Its assent shall be presumed so long as the contrary is not indicated, unless the treaty otherwise provides.[240]

The parties to the 2010 Nile Basin Agreement intended the treaty to accord rights to a group of states called the "Nile Basin States".[241] The agreement defines a "Nile Basin State" as a State party to the agreement in whose territory the Nile River Basin is situated.[242] Egypt and Sudan were not parties to the 2010 Nile Basin Agreement.[243] Therefore, the agreement cannot intend to accord them any rights.

A couple of years before the creation of the Nile Basin Action Plan in 1995[244], Egypt and Ethiopia reached their first agreement regarding the uses of the Blue Nile river.[245] The agreement provided a framework for water use, including a provision requiring each party to refrain from causing appreciable harm to the interest of the other party. Article 5 of the 1993 Agreement provides: "Each party shall refrain from engaging in any activity related to the waters that may

[237] Chelkaba, *supra* note 20, at 17 n.8.
[238] *Id*.
[239] Goad, *supra* note 38, at 915.
[240] VCLT, *supra* note 200, art. 36(1).
[241] 2010 Nile Basin Agreement, *supra* note 232, art. 1.
[242] *Id*., art. 2(d).
[243] Meshel, *Swimming against the Current*, *supra* note 48, at 180.
[244] Williams, *supra* note 210, at 341.
[245] Framework for General Cooperation, Egypt-Eth., Jul. 1, 1993, 2693 U.N.T.S. 71 [hereinafter 1993 Agreement].

cause appreciable harm to the interests of the other party."[246] There was not a word about equitable and reasonable utilization, a principle codified in the Helsinki Rules as far back as 1966.[247] But this was a step in the right direction. In 2015, Egypt, Ethiopia and Sudan would conclude the GERD Agreement.[248]

Under customary treaty law, a later treaty concluded on the same subject matter can terminate a prior treaty. Article 59(1)(a) of VCLT provides: "A treaty shall be considered as terminated if all the parties to it conclude a later treaty relating to the same subject matter and it appears from the later treaty or is otherwise established that the parties intended that the matter should be governed by that treaty."[249] Therefore, the 1993 Agreement can be considered as having been terminated by the 2015 GERD Agreement.

Legal Effect of the 2015 GERD Agreement

Egypt, Ethiopia and Sudan signed the 2015 GERD Agreement.[250] A state that has signed a treaty subject to ratification is obliged to refrain from acts which would defeat the object and purpose of the treaty.[251] While there is no obligation for Egypt, Ethiopia and Sudan to perform the GERD Agreement in good faith before ratification,[252] they have the obligation not to defeat its object and purpose.[253]

Under customary treaty law codified in the VCLT, a state's obligation when it has only signed an agreement is quite different from its obligation when it has signed and ratified the

[246] *Id*., art. 5.
[247] *See* Helsinki Rules, *supra* note 138.
[248] *See* GERD Agreement, *supra* note 171.
[249] VCLT, *supra* note 200, art. 59(1)(a).
[250] *See* GERD Agreement, *supra* note 171.
[251] VCLT, *supra* note 200, art. 18(a).
[252] *Id*., art. 26.
[253] *Id*., art. 18(a).

agreement.[254] When a state has only signed an agreement, its obligation falls under article 18(a), which provides:

> A State is obliged to refrain from acts which would defeat the object and purpose of a treaty when it has signed the treaty or has exchanged instruments constituting the treaty subject to ratification, acceptance or approval, until it shall have made its intention clear not to become a party to the treaty.[255]

When a state has signed and ratified an agreement, its obligation falls under article 26 of VCLT, which provides: "Every treaty in force is binding upon the parties to it and must be performed by them in good faith."[256]

It may be worth mentioning, the VCLT provisions apply to a treaty and under article 2(1)(a), ""treaty" means an international agreement concluded between States in written form and governed by international law, whether embodied in a single instrument or in two or more related instruments and whatever its particular designation."[257] In the present matter, regardless of what the parties to the GERD Agreement decided to call their agreement, whether they decided to call it an agreement on declaration of principles or otherwise, their agreement is a treaty under article 2(1)(a) of the VCLT. This is also true for all the other agreements mentioned in this paper.

Based on the foregoing, two conclusions can be drawn: first, when a state has only signed an agreement, a violation of a provision of that agreement becomes a violation of the state's obligation under article 18(a) of the VCLT if the violation defeats the object and purpose of the agreement; and second, when a state has signed and ratified an agreement, the violation of a provision of that agreement is automatically a violation of the state's treaty obligation under article 26 of the VCLT.

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[254] *See* VCLT, *supra* note 200, art. 18 and 26.
[255] *Id*., art. 18(a).
[256] *Id*., art. 26.
[257] *Id*., art. 2(1)(a).

Since Egypt, Ethiopia and Sudan only signed the GERD Agreement, their obligations with respect to it fall under article 18(a) of the VCLT. That is, they have the obligation to refrain from acts which would defeat the object and purpose of the agreement. The object and purpose of the 2015 GERD Agreement is to commit Egypt, Ethiopia and Sudan to certain principles on the Ethiopian dam project, including the principle of equitable and reasonable utilization.[258] The preamble to the agreement also states: "cognizant of the significance of the River Nile as the source of livelihood and the significant resource to the development of the people of Egypt, Ethiopia and Sudan, the three countries have committed to the following principles on the GERD."[259] One of the principles the three states committed to is the principle of equitable and reasonable utilization.[260] Since they have signed the GERD Agreement, Egypt, Ethiopia and Sudan have the obligation to refrain from acts which would defeat the equitable and reasonable utilization of the waters of the Blue Nile river.

III. ETHIOPIA'S FIRST FILLING OF THE GERD VIOLATED THE EQUITABLE AND REASONABLE UTILIZATION PRINCIPLE

The equitable and reasonable utilization principle is a fundamental pillar of international water law[261] and has customary law status[262]. The principle applies to the Nile river as customary international law.[263] In the GERD Agreement, Egypt, Ethiopia and Sudan agreed on the customary international law principle of equitable and reasonable utilization.[264] Since the three states signed

[258] GERD Agreement, *supra* note 171, preamble.
[259] *Id*.
[260] *See supra* note 174.
[261] Devlaeminck, *supra* note 172, at 305.
[262] Meshel, *Duty to Cooperate*, *supra* note 116, at 29.
[263] Meshel, *Swimming against the Current*, *supra* note 48, at 181.
[264] *See* GERD Agreement, *supra* note 171.

but did not ratify the GERD Agreement, each state's obligation is to refrain from acts which would defeat the equitable and reasonable utilization principle.[265]

What Equitable and Reasonable Utilization Means

Principle IV, paragraph 1 of the GERD Agreement requires Egypt, Ethiopia and Sudan to utilize the Blue Nile river in an equitable and reasonable manner.[266]

A treaty is interpreted in good faith in accordance with the ordinary meaning of its terms in their context and in the light of its object and purpose.[267] Together with the context of the treaty, any relevant rules of international law applicable in relations between the parties are taken into account.[268] According to article 38(1)(d) of the ICJ Statute, judicial decisions can be used as "subsidiary means for the determination of rules of law".[269] It should be kept in mind, all the ICJ cases used here are used simply to illuminate a rule of law; they are not used as binding precedent. The parties to the present dispute – Egypt, Sudan and Ethiopia, were not parties in any of the cases cited below. Article 59 of the ICJ Statute provides, "The decision of the Court has no binding force except between the parties and in respect of that particular case."[270] Therefore, the ICJ decisions have no binding force on the parties in the present dispute but can serve as subsidiary means to determine the rules of law.

The ICJ addressed the issue of equitable and reasonable utilization in only two cases: in 1997, it ruled on the dispute between Hungary and Slovakia concerning the Gabcikovo-Nagymaros

[265] *See supra* note 255.
[266] *See supra* note 174.
[267] VCLT, *supra* note 200, art. 31(1).
[268] *Id*., art. 31(3)(c).
[269] ICJ Statute, *supra* note 199, art. 38(1)(d).
[270] *Id*., art. 59.

dam project on the Danube river.[271] And in 2010, it ruled on the dispute between Argentina and Uruguay concerning pulp mills on the Uruguay river.[272]

Gabcikovo-Nagymaros involved a dispute between Hungary and Slovakia about a hydroelectric dam project on the Danube river. In 1977, Hungary and Czechoslovakia signed a treaty for the joint investment and construction of the Gabcikovo-Nagymaros hydroelectric dam on the Danube river. In 1989, Hungary backed out of the joint project. Czechoslovakia came up with an alternative plan to divert the Danube from flowing to Hungary, and to generate electricity on Czechoslovak territory. In 1991, Czechoslovakia began the diversion and Hungary sued at the ICJ. Slovakia carried on the dispute after the dissolution of Czechoslovakia in 1993.[273] The ICJ approved of the equitable and reasonable utilization principle and confirmed its status as a general rule of international law[274], and a guiding principle of international water law.[275] The Court found that unilateral control of a shared resource by one riparian state deprived another riparian state its right to an equitable and reasonable share of a river.[276] The Court also held that a state's right to unilaterally build a dam on a shared watercourse within its territory was subject to limitations.[277] The Court's decision in *Gabcikovo-Nagymaros* renders unilateral control of a shared resource by a state a depravation of another state's share in the equitable and reasonable utilization of the shared resource:

> The Court considers that Czechoslovakia, by unilaterally assuming control of a shared resource, and thereby depriving Hungary of its right to an equitable and reasonable share of the natural resources of the Danube - with the continuing effects of the diversion of these waters on the ecology of the riparian area of the

[271] *Gabcikovo-Nagymaros Project* (Hung. v. Slovk.), Judgment, 1997 I.C.J. 7 (Sept. 25) [hereinafter *Gabcikovo-Nagymaros*].
[272] *Pulp Mills on River Uruguay* (Arg. v. Uru.), Judgment, 2010 I.C.J. 14 (Apr. 20) [hereinafter *Pulp Mills*].
[273] *See generally Gabcikovo-Nagymaros supra* note 271.
[274] Bode, *supra* note 89, at 102.
[275] Meshel, *Swimming against the Current*, *supra* note 48, at 157.
[276] *Id*., at 172.
[277] Goad, *supra* note 38, at 917.

Szigetkoz - failed to respect the proportionality which is required by international law.[278]

Whether Ethiopia Assumed Unilateral control of the Blue Nile River

In *Gabcikovo-Nagymaros*, the ICJ found that the diversion of 90% of the Danube waters for hydroelectric generation violated the equitable and reasonable utilization principle.[279] In the present matter, Ethiopia diverted 4.9 BCM of the waters of the Blue Nile river.[280] This comes to about 5.8% of the Nile's annual flow of 84 BCM.[281] On its face, the Court's decision in *Gabcikovo-Nagymaros* would seem to indicate that the diversion of 5.8% of total annual flow would not violate the equitable and reasonable utilization principle. Moreover, Czechoslovakia's diversion of the Danube lasted for years[282], whereas Ethiopia's diversion of the Blue Nile lasted for no more than seven days[283]. Therefore, it is not clear whether Ethiopia assumed unilateral control of the Blue Nile river. This is why the equitable and reasonable utilization principle is sometimes considered to be fair but too vague and indeterminate to be effective.[284] Further reading into the Court's decision to extract meaning that would be applicable to the present case would be speculative at best. Such absence of guidance is one reason why the disagreements over whether unilateral activities may or may not be equitable and reasonable are endless.[285]

Whether Ethiopia Took Into Account the Existing Uses of the Blue Nile River

Upper riparian states cannot ignore the interests of lower riparian states when implementing projects that may affect the flow of water to the lower riparian states.[286] However, the right to have its interests taken into account, does not entail a state's right to veto projects for

[278] *Gabcikovo-Nagymaros*, *supra* note 271, at para. 85.
[279] Anthony Dan Tarlock, *Transboundary Waters: Won't You Be My Neighbor?*, 20 WYO. L. REV. 451, 457 (2020).
[280] *See supra* notes 18 and 19.
[281] Tekuya, *supra* note 19.
[282] *See generally Gabcikovo-Nagymaros*, *supra* note 271.
[283] *See supra* note 18.
[284] Meshel, *Swimming against the Current*, *supra* note 48, at 182.
[285] *Id*., at 170.
[286] Boute, *supra* note 91, at 401.

the exploitation of water resources.[287] In its 2010 decision in the *Pulp Mills* case, the ICJ took the position that equitable and reasonable utilization required a state to take into account the interests of another riparian state in the shared resource.[288]

Pulp Mills involved a dispute between Argentina and Uruguay. In 1975, Argentina and Uruguay signed a treaty for jointly achieving the optimum and rational utilization of the Uruguay river. Then in 2005, Uruguay started building two pulp mills on the Uruguay river. Argentina feared the pulp mills would affect the quality of the waters of the river and sued Uruguay at the ICJ.[289] The Court held that states must take into account the interests of other states in utilizing a shared resource: "utilization could not be considered to be equitable and reasonable if the interests of the other riparian State in the shared resource and the environmental protection of the latter were not taken into account."[290] *Pulp Mills* put the taking into account of another state's interest at the center of the determination of whether a particular utilization is equitable and reasonable.[291]

When Egypt, Ethiopia and Sudan agreed on the principle of equitable and reasonable utilization, they also agreed on the factors which would determine whether utilization is equitable and reasonable.[292] As was shown above, the factors in the GERD Agreement were taken from prevailing customary international water law, specifically article 13 of the Berlin Rules[293]. One of the factors of principle IV the three states agreed on is factor (e) which requires them to take into account "existing and potential uses of the water resources".[294]

[287] *Id*., at 371.
[288] Meshel, *Swimming against the Current*, *supra* note 48, at 157.
[289] *See generally Pulp Mills*, *supra* note 272.
[290] *Pulp Mills*, *supra* note 272, at para. 177.
[291] Meshel, *Swimming against the Current*, *supra* note 48, at 175.
[292] *See supra* note 174.
[293] *See supra* note 166.
[294] *See supra* note 292.

An argument can be made that during its first filling of the GERD, Ethiopia took into account some of the interests of the downstream states by publicizing in advance its plans and by conducting the first filling during the rainy season.[295] Moreover, while Ethiopia impounded 5.8% of the waters of the Blue Nile river, it did not stop the entire water flow to the downstream states.[296] However, factor (e)'s requirement to take into account existing uses deserves a closer look.

Existing Uses in the Nile Basin

Since the third millennium B.C.E., Egyptian civilization flourished on the Nile, leading to Egyptian domination of the political and economic interests of the river.[297] In modern times, the 1929 and 1959 agreements are the basis upon which Egypt and Sudan claim historical rights over the entire flow of the Nile river.[298] Egypt maintains that the historic treaties which gave it monopoly over the Nile river are binding on the other Nile basin states.[299] Egypt even argues it needs more water than was allocated to it in the 1959 Agreement.[300] While Ethiopia emphasizes its right to an equitable share of the Nile waters, Egypt stresses what it calls its "historic" rights to the river.[301]

The irony of the 1929 and 1959 agreements is that those riparian states which contribute no water to the Nile river make the most claims to its waters: "Although the Nile is shared by 11 riparian states with burgeoning populations and economies highly dependent on agriculture, the status quo vests Egypt and Sudan - downstream riparian states with little or negative contribution - with exclusive right over the entire flow."[302] Some scholars take the position that, by adhering to

[295] *See supra* note 4.
[296] *See supra* notes 18 and 19.
[297] Richards, *supra* note 26.
[298] Mekonnen, *supra* note 36, at 257.
[299] Goad, *supra* note 38, at 915.
[300] Richards, *supra* note 26, at 15-16.
[301] Meshel, *Swimming against the Current*, *supra* note 48, at 181.
[302] Mekonnen, *supra* note 36, at 258.

the 1929 and 1959 agreements, Egypt and Sudan have shown their determination to deny the upstream riparian states any right in consumptive utilization of the Nile waters.[303] Even for their time, the inequitable arrangement of the 1929 and 1959 agreements had no basis in international water law.[304] As far back as the 1911 Madrid Declaration and the 1923 Hydraulic Power Convention, cooperation between all riparian states was the accepted international norm.[305]

Both the 1929 and the 1959 agreements created an Egyptian monopoly of the waters of the Nile and excluded Ethiopia's interests.[306] As shown above, Ethiopia did not consent to be bound by the 1929 and 1959 agreements, and therefore, is not bound by them.[307] However, by agreeing to factor (e) in principle IV of the GERD Agreement, Ethiopia agreed to take into account existing uses which were set up by the 1929 and 1959 agreements. Regardless of how unfair the arrangements under those agreements were, Ethiopia agreed to take into account the existing uses of the Blue Nile waters.[308]

Under the equitable and reasonable utilization principle, all riparian nations on an international river are alike entitled to an equitable apportionment of water from the common river.[309] That means Ethiopia, just like Egypt and Sudan, is entitled to an equitable share of the waters. Equitable and reasonable utilization does not guarantee each riparian state an equal share of water from an international watercourse; rather, it guarantees each state an equal right to an equitable share of the uses and benefits of an international watercourse.[310] The equitable and reasonable utilization principle is rooted in the sovereign equality states have in their dealings with

[303] *Id*., at 257.
[304] *Id*., at 258.
[305] *See supra* notes 117 and 122.
[306] Goad, *supra* note 38, at 914.
[307] *See* VCLT, *supra* note 200, art. 2(1)(g).
[308] *See supra* note 174.
[309] Qureshi, *IWT and UNWC*, supra note 123, at 113.
[310] Bode, *supra* note 89, at 102.

each other.[311] The principle imposes a limitation on a state's sovereignty; that is, a state is unable to unilaterally exacerbate the risks or impacts of a reduction in water by using more than its fair share of an international river.[312] If nothing else, the equitable and reasonable utilization principle prohibits any one basin state from monopolizing the supply of an international river.[313] The existing uses established by the 1929 and 1959 agreements deny the nine Nile basin states any right to the waters.[314] That is why the Nile basin states, including Ethiopia, came together to negotiate the 2010 agreement.[315]

The question that needs to be asked at this juncture is: Despite its objections to the 1929 and 1959 agreements, did Ethiopia waive its objections when it signed the GERD Agreement and agreed to take into account existing uses of the Blue Nile river?

Whether Ethiopia was a "Persistent Objector" with respect to the 1929 and 1959 Agreements

Under customary international law, a rule is not opposable to a state that has objected the rule while the rule was in the process of formation, provided the state's objection was maintained persistently:

> 1. Where a State has objected to a rule of customary international law while that rule was in the process of formation, the rule is not opposable to the State concerned for so long as it maintains its objection.
>
> 2. The objection must be clearly expressed, made known to other States, and maintained persistently.[316]

Applying the persistent objector rule in the *Asylum Case*, the ICJ stated: "The Party which relies on a custom of this kind must prove that this custom is established in such a manner that it

[311] Meshel, *Duty to Cooperate*, *supra* note 116, at 29 n.2.
[312] Anthony Dan Tarlock, *Toward a More Robust International Water Law of Cooperation to Address Droughts and Ecosystem Conservation*, 28 GEO. ENVTL. L. REV. 261, 272 (2016).
[313] *Id*., at 290.
[314] Mekonnen, *supra* note 36, at 258.
[315] Richards, *supra* note 26, at 17.
[316] ILC, "Draft conclusions on identification of customary international law and commentaries thereto", Report of the International Law Commission, Seventieth Session (30 April-1 June and 2 July-10 August 2018), U.N. Doc. A/73/10 (2018), pp. 119-156 [hereinafter Draft Conclusions on Customary Law], conclusion 15.

has become binding on the other Party."[317] Based on the ICJ's formulation of the rule, Egypt and Sudan must prove that the existing uses of the Blue Nile river established by the 1929 and 1959 agreements have become binding upon Ethiopia. As already mentioned, Ethiopia has not consented to be bound by these agreements.[318]

The persistent objector rule raises the question whether the water use arrangements made in the 1929 and 1959 agreements gave rise to a rule of customary international law. Customary international law requires a general practice that is accepted as law (*opinio juris*).[319] General practice refers to the practice of states that contributes to the formation, or expression, of rules of customary international law,[320] including diplomatic acts and correspondence[321]. *Opinio Juris* refers to the acceptance of state practice as law, including through treaty provisions.[322]

The state practice in the Blue Nile basin, at least until the construction of the GERD, showed that Egypt and Sudan had total control of the Nile waters.[323] This was the case since ancient times.[324] However, the Nile basin states, including Ethiopia, have objected to the full utilization of the Nile waters by Egypt and Sudan only.[325] In other words, the *opinio juris* requirement of acceptance of state practice as law is missing. Therefore, the water use arrangements made in the 1929 and 1959 agreements did not give rise to a rule of customary international law. That is, the persistent objector rule which might have allowed Ethiopia to claim a status as a persistent objector to the existing uses set up in the 1929 and 1959 agreements is inapplicable to the present case.

[317] *Asylum Case (Colombia v. Peru)*, 1950 I.C.J. 266 (Nov. 20), at 276.
[318] *See supra* note 217.
[319] Draft Conclusions on Customary Law, *supra* note 316, conclusion 2.
[320] *Id*., conclusion 4(1).
[321] *Id*., conclusion 6(1).
[322] *Id*., conclusion 10(2).
[323] *See supra* note 298.
[324] Richards, *supra* note 26.
[325] *Id*., at 17.

Assuming arguendo the 1929 and 1959 arrangements gave rise to a rule of customary international law, Ethiopia would still not be able to claim a status as a persistent objector to those arrangements. In its comments to article 15 of the Draft Conclusions on Customary Law, the ILC stated: "The requirement that the objection be maintained persistently applies both before and after the rule of customary international law has emerged."[326] By agreeing to take into account the existing uses of the Blue Nile river as required in the GERD Agreement,[327] Ethiopia's persistent objection to the existing uses ceases to be persistent.

This may sound inequitable considering the fact that Ethiopia contributes about 86% of the Nile's total water flow[328]. At the base of the equitable and reasonable utilization principle is the notion that all countries are sovereign nations and that no state is superior to another.[329] Because all countries are equal, the only way they have a right to use a collective resource like an international river is collectively, with no riparian state having more rights than another on the same river.[330] However, the language of the GERD agreement is quite clear: Egypt, Ethiopia and Sudan agreed to take into account existing uses.[331]

Some scholars suggest that the equitable and reasonable utilization principle imposes on states a duty to refrain from acting inconsistently with the interests of other states.[332] That may be true, but also true is the fact that a state knows or should know better than anyone else what is in its own interest. Ethiopia decided it was in its interest to sign the GERD Agreement. Ethiopia decided it was in its interest to take into account the existing uses of the Blue Nile river.

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[326] *See supra* note 319, comment n.9 to conclusion 15.
[327] GERD Agreement, *supra* note 174, factor e.
[328] Chelkaba, *supra* note 20.
[329] Qureshi, *IWT and UNWC*, *supra* note 123, at 115.
[330] *Id*.
[331] *See supra* note 327.
[332] C. Mark Macneill, *Navigating the Mississippi International Watercourse: The Right of Innocent Passage: A Riparian Opportunity for Canada & Mexico*, 37 Wis. INT'l L.J. 88, 103 (2019).

According to the existing uses of the Blue Nile river before the first filling of the GERD, Egypt and Sudan used to get 100% of the waters of the Blue Nile river.[333] During the first filling, Ethiopia impounded 4.9 BCM of water from the Blue Nile river.[334] Ethiopia has the obligation to refrain from acts which would defeat the object and purpose of the GERD Agreement. The object and purpose of the GERD Agreement was, inter alia, to commit Egypt, Ethiopia and Sudan to the equitable and reasonable utilization principle by having them take into account the existing uses of the Blue Nile river. By impounding 4.9 BCM of water, Ethiopia failed to take into account the existing uses of the river.

Taken together, the *Gabcikovo-Nagymaros* and *Pulp Mills* decisions illustrate that: (1) a state's assumption of unilateral control of a shared resource deprives the other states of their share in the equitable and reasonable utilization of the shared resource;[335] and (2) a riparian state's utilization of a shared resource could not be considered to be equitable and reasonable if the interests of other riparian states in the shared resource were not taken into account.[336] Applying this formulation of the equitable and reasonable utilization principle to the dispute at hand would mean that: first, Ethiopia may not assume unilateral control of the Blue Nile river without depriving Sudan and Egypt of their share in the equitable and reasonable utilization of the river; and second, Ethiopia's utilization of the Blue Nile river cannot be considered to be equitable and reasonable if the interests of Sudan and Egypt in the river are not taken into account.

As previously explained, from the information available at the time of writing, it is not clear whether Ethiopia assumed unilateral control of the Blue Nile river during the first filling of the GERD. What is clear, however, is that Ethiopia did not take into account the existing uses of the

[333] *See supra* note 323.
[334] *See supra* note 18.
[335] *See Gabcikovo-Nagymaros*, *supra* note 271.
[336] *See Pulp Mills*, *supra* note 272.

river which give 100% of the waters of the Nile to Egypt and Sudan. Therefore, Ethiopia's utilization of the waters of the Blue Nile river during the first filling of the GERD cannot be considered to be equitable and reasonable. That is, Ethiopia's first filling of the GERD violated the equitable and reasonable utilization principle.

To conclude that the upper riparian state contributing all the waters of an international river cannot touch the waters without violating the equitable and reasonable utilization principle while the lower riparian states use all the waters seems absurd. Granted, the absurdity is not in the conclusion but in the legal regime set up by the parties.

IV. ETHIOPIA COMMITTED AN INTERNATIONALLY WRONGFUL ACT DURING THE FIRST FILLING OF THE GERD

Under customary international law codified in the ILC's Draft Articles on the Responsibility of States for Internationally Wrongful Acts[337] (ARSIWA), a state has responsibility for every one of its internationally wrongful acts.[338] Article 2 of ARSIWA defines the elements of an internationally wrongful act of a state as follows: "There is an internationally wrongful act of a State when conduct consisting of an action or omission: (a) is attributable to the State under international law; and (b) constitutes a breach of an international obligation of the State."[339] For Ethiopia's acts during the first filling of the GERD to be internationally wrongful, the two elements of article 2 must be met: first, Ethiopia's impounding of 4.9 BCM of water from the Blue Nile river must be a conduct consisting of an action or omission attributable to Ethiopia under

[337] ILC, *Draft Articles on Responsibility of States for Internationally Wrongful Acts*, November 2001, Supplement No. 10 (A/56/10), chp.IV.E.1 [hereinafter ARSIWA].
[338] *Id*., art. 1.
[339] *Id*., art. 2.

international law;[340] and second, Ethiopia's impounding of the water must constitute a breach of Ethiopia's international obligation.[341]

Conduct Attributable to Ethiopia

When a state acknowledges a conduct and adopts it as its own, the conduct can be attributed to that state. Article 11 of ARSIWA provides: "Conduct which is not attributable to a State under the preceding articles shall nevertheless be considered an act of that State under international law if and to the extent that the State acknowledges and adopts the conduct in question as its own."[342] Ethiopia has acknowledged the impounding as its own conduct.[343] By its own admission, the Ethiopian government diverted the waters of the Blue Nile river during the first filling of the GERD between July 15 and 22, 2020.[344] These facts are uncontroverted by any party at this point. In fact, the Ethiopian government made it a point of honor to claim the conduct.[345] Therefore, under article 11 of ARSIWA, the impounding of 4.9 BCM of water from the Blue Nile river during the first filling of the GERD is a conduct attributable to Ethiopia under international law.

Breach of Ethiopia's International Obligation

Having established there was indeed conduct consisting of an action or omission attributable to Ethiopia, the only question remaining is whether the conduct so established constitutes a breach of Ethiopia's international obligation.

As a preliminary matter, before a state's conduct can constitute a breach of that state's international obligations, there must exist international obligations that bind the state at the time of the conduct. Article 13 of ARSIWA provides: "An act of a State does not constitute a breach of

[340] *Id*., art. 2(a).
[341] *Id*., art. 2(b).
[342] *Id*., art. 11.
[343] *See supra* note 15.
[344] *Id*.
[345] *Id*.

an international obligation unless the State is bound by the obligation in question at the time the act occurs."[346] As discussed already, Ethiopia has signed the GERD Agreement. As a result, it has the obligation to refrain from acts which would defeat the object and purpose of that agreement.[347] The object and purpose of the GERD agreement is, among other things, to commit Egypt, Ethiopia and Sudan to the equitable and reasonable utilization principle.[348]

According to article 12 of ARSIWA, "There is a breach of an international obligation by a State when an act of that State is not in conformity with what is required of it by that obligation, regardless of its origin or character."[349] By withdrawing 4.9 BCM of water from the Blue Nile river during the first filling of the GERD, Ethiopia violated the equitable and reasonable utilization principle. Such breach on Ethiopia's part is a breach of its international obligation to refrain from acts which would defeat the object and purpose of the GERD Agreement.[350]

The two elements of an internationally wrongful act of a state are met. Therefore, Ethiopia committed an internationally wrongful act during the first filling of the GERD.

V. REMEDIES

Ethiopia's violation of the equitable and reasonable utilization principle has legal consequences.[351] For the time being, the conduct, namely the diversion of the Blue Nile waters to fill the GERD, has ceased. However, Ethiopia has announced its plans to do the same thing next year but only on a bigger scale.[352] Even if it has ceased its internationally wrongful act, Ethiopia still has the obligation to offer appropriate assurances and guarantees of non-repetition to the

[346] ARSIWA, *supra* note 337, art. 13.
[347] VCLT, *supra* note 200, art. 18(a).
[348] GERD Agreement, *supra* note 171, preamble.
[349] ARSIWA, *supra* note 337, art. 12.
[350] *Id*., art. 2(b).
[351] *Id*., art. 28.
[352] *See supra* note 82.

injured parties, if circumstances so require.[353] Because it has announced its plans to engage in the same conduct next year even on a grander scale, the circumstances do require Ethiopia to offer the appropriate assurances and guarantees of non-repetition to Sudan and Egypt. However, that is not all that can be expected of Ethiopia.

Under article 31 of ARSIWA, Ethiopia has the obligation to make full reparation to the states injured by its internationally wrongful act: "(1) The responsible State is under an obligation to make full reparation for the injury caused by the internationally wrongful act. (2) Injury includes any damage, whether material or moral, caused by the internationally wrongful act of a State."[354] Ethiopia is under an obligation to make full reparation to Egypt and Sudan for the injury it caused them through its internationally wrongful act. Egypt and Sudan have condemned what they characterized as Ethiopia's unilateral conduct during the first filling of the GERD.[355] However, there is no assertion yet by either state that it was significantly harmed by Ethiopia's withdrawal of 4.9 BCM of water from the Blue Nile river between July 15 and 22, 2020. Even so, to the extent a state acts as if the other states do not exist at all, there is harm even if there is no physical damage.[356]

Full reparation for injury caused by an internationally wrongful act can take the form of restitution, compensation or satisfaction.[357] A state that engages in an internationally wrongful act is obligated to re-establish the situation which existed before the wrongful act was committed, provided it is not materially impossible.[358] This is restitution. Restitution would mean Ethiopia releasing the 4.9 BCM of water that is currently being held back by the GERD. Compensation is

[353] ARSIWA, *supra* note 337, art. 30(b).
[354] *Id*., art. 31.
[355] *See supra* note 17.
[356] Bode, *supra* note 89, at 102.
[357] ARSIWA, *supra* note 337, art. 34.
[358] *Id*., art. 35.

another form reparation can take. A state that commits an internationally wrongful act is obligated to compensate the affected states, if the damage caused to them cannot be made good by restitution.[359] However, the damage must be financially assessable.[360] A state responsible for an internationally wrongful act has the obligation of giving satisfaction to the injured states to the extent their injuries cannot be made good by restitution or compensation.[361] Satisfaction could mean an acknowledgement of the wrong, an expression of regret or a formal apology, provided the form is not humiliating to the responsible state.[362]

Although full reparation can take any of the three forms just mentioned, it is up to the injured states to specify what form reparation should take.[363] Assuming the damage to Egypt and Sudan due to Ethiopia's withdrawal of 4.9 BCM of water from the Blue Nile river can be financially assessable, they would have the option of picking the form of reparation they prefer.

Jurisdiction of the International Court of Justice (ICJ)

Egypt and Sudan can seek relief from the ICJ. Before a proceeding at the ICJ can materialize, however, Egypt and Sudan would have to give a notice of their claims to Ethiopia. Article 43(1) of ARSIWA states: "An injured State which invokes the responsibility of another State shall give notice of its claim to that State."[364] At the time of writing, Sudan and Egypt have not yet given notice of their claims to Ethiopia. They have criticized what they called Ethiopia's unilateral first filling of the GERD, but they have not yet given notice of claims to Ethiopia as required by article 43(1).[365] The responsibility of a state may not be invoked if the claims are not

[359] *Id*., art. 36.
[360] *Id*.
[361] *Id*., art. 37(1).
[362] *Id*., art. 37(2) and (3).
[363] *Id*., art. 43(2)(b).
[364] *Id*., art. 43(1).
[365] *See supra* note 17.

brought in accordance with any applicable rule relating to the nationality of claims.[366] Therefore, Sudan and Egypt may not invoke Ethiopia's international responsibility under ARSIWA before giving Ethiopia the proper notice of claims.

If Sudan and Egypt decide to give Ethiopia notice of their claims and invoke Ethiopia's responsibility for its internationally wrongful act, they can then proceed to the ICJ to seek full reparations from Ethiopia or a declaratory judgement. Under article 93(1) of the UN Charter, as members of the UN Egypt, Sudan and Ethiopia are "ipso facto parties to the Statute of the International Court of Justice."[367] Each of them "undertakes to comply with the decision of the International Court of Justice in any case to which it is a party,"[368] failing which they will be subject to recommendations or decisions the Security Council may take to give effect to the Court's judgement.[369] But before the ICJ can do anything, first it must have jurisdiction over the dispute. Article 36 of the ICJ Statute establishes the Court's jurisdiction:

> 1. The jurisdiction of the Court comprises all cases which the parties refer to it and all matters specially provided for in the Charter of the United Nations or in treaties and conventions in force.
>
> 2. The states parties to the present Statute may at any time declare that they recognize as compulsory ipso facto and without special agreement, in relation to any other state accepting the same obligation, the jurisdiction of the Court in all legal disputes concerning:
>
> (a) the interpretation of a treaty;
>
> (b) any question of international law;
>
> (c) the existence of any fact which, if established, would constitute a breach of an international obligation;
>
> (d) the nature or extent of the reparation to be made for the breach of an international obligation. [370]

Under article 36(1), Egypt and Sudan can refer the dispute to the ICJ and ICJ would have jurisdiction over the dispute if the matter involved in the dispute was "specially provided for" in

[366] ARSIWA, *supra* note 337, art. 44(a).
[367] United Nations, *Charter of the United Nations*, 24 October 1945, 1 UNTS XVI [hereinafter UN Charter], art. 93(1).
[368] *Id*., art. 94(1).
[369] *Id*., art. 94(2).
[370] ICJ Statute, *supra* note 199, art. 36.

treaties. Two treaties are relevant here: the 2010 Nile Basin Agreement and the 2015 GERD Agreement.

The 2010 Nile Basin Agreement requires the Nile Basin States to submit a dispute to the ICJ. Article 34(1)(a) provides:

> In the event of a dispute between two or more Nile Basin States concerning the interpretation or application of the present Framework, the States concerned shall, in the absence of an applicable agreement between them, seek a settlement of the dispute by peaceful means in accordance with the following provisions: (a) If the States concerned cannot reach agreement by negotiation requested by one of them, they may jointly seek good offices, or request mediation or conciliation by, the Nile River Basin Commission or other third party, or agree to submit the dispute to arbitration, in accordance with procedures to be adopted by the Council, or to the International Court of Justice.[371]

Article 34(1)(a) would bring the present dispute under the jurisdiction of the ICJ were it not for this fact: The 2010 Nile Basin Agreement defines a "Nile Basin State" as "a State party to the present Framework in whose territory part of the Nile River Basin is situated."[372] Whereas Ethiopia signed and ratified the agreement, Egypt and Sudan were not parties to it.[373] Therefore, for the purpose of article 34(1)(a), Egypt and Sudan do not qualify as Nile Basin States. Ethiopia would not be required to submit to the ICJ's jurisdiction under this provision.

The 2015 GERD Agreement has a provision for the peaceful settlement of disputes between Egypt, Ethiopia and Sudan. Principle X provides:

> The Three countries will settle disputes, arising out of the interpretation or implementation of this agreement, amicably through consultation or negotiation in accordance with the principle of good faith. If the Parties are unable to resolve the dispute through consultation or negotiation, they may jointly request for conciliation, mediation or refer the matter for the consideration of the Heads of State/Head of Government.[374]

[371] 2010 Nile Basin Agreement, *supra* note 232, art. 34(1)(a).
[372] *Id*., art. 2(d).
[373] *See supra* note 237 and 239.
[374] GERD Agreement, *supra note* 171, principle X.

Principle X is not much consolation for Egypt and Sudan. At most, it calls for a political resolution of disputes by referring the issues for the consideration of the Heads of the three governments. Therefore, neither the 2010 Nile Basin Agreement nor the 2015 GERD Agreement would establish the ICJ's jurisdiction under article 36(1) of the ICJ Statute.

Under article 36(2) of the ICJ Statute, Egypt and Sudan may refer the dispute to the ICJ for its interpretation of the GERD Agreement and its determination of the nature and extent of the necessary reparations. However, this would require Egypt, Ethiopia and Sudan to "declare that they recognize as compulsory ipso facto and without special agreement, in relation to any other state accepting the same obligation, the jurisdiction of the Court."[375] Egypt and Sudan made such a declaration in 1957 and 1958, respectively. Ethiopia has not yet declared that it recognizes the ICJ's compulsory jurisdiction.[376] In its declaration, Egypt made no reservations in recognizing the jurisdiction of the ICJ as compulsory.[377] Sudan recognized the jurisdiction of the ICJ as compulsory except in "disputes in regard to which the parties to the dispute have agreed or shall agree to have recourse to some other method of peaceful settlement".[378]

Because Ethiopia does not recognize the ICJ's jurisdiction as compulsory, article 36(2) of the ICJ Statute fails to establish the ICJ's jurisdiction in the present dispute. Moreover, even if Ethiopia recognized the ICJ's jurisdiction as compulsory, Egypt may be able to refer the dispute to the ICJ. However, because principle X of the GERD Agreement falls squarely under the language of Sudan's reservation, Sudan will not be able to refer the dispute to the ICJ.[379]

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[375] *See supra* note 370.
[376] For status of declarations recognizing the jurisdiction of the ICJ as compulsory (Jan. 29, 2020, 10:57 AM), *see* https://www.icj-cij.org/en/declarations.
[377] For Egypt's declaration recognizing the jurisdiction of the ICJ as compulsory (Jan. 29, 2020, 10:58 AM), *see* https://www.icj-cij.org/en/declarations/eg.
[378] For Sudan's declaration recognizing the jurisdiction of the ICJ as compulsory (Jan. 29, 2020, 11:00 AM), *see* https://www.icj-cij.org/en/declarations/sd.
[379] *See supra* note 374.

Therefore, even if Egypt and Sudan invoke Ethiopia's responsibility for its internationally wrongful act by giving Ethiopia notice of their claims, there is nothing the ICJ can do for them without jurisdiction. Egypt and Sudan are entitled to seek full reparations from Ethiopia. However, as shown above, the ICJ does not have jurisdiction over the matter. The only option open to them, absent Ethiopia recognizing the ICJ's jurisdiction as compulsory, is to try to work out a political solution at the Head of State/Government level as required by the GERD Agreement.

VI. TWO LESSONS FROM THE MEKONG AND INDUS RIVER BASINS

The Nile basin countries, be it said to their credit, despite their disagreements, have accepted the international water law principle of equitable and reasonable utilization. The 2010 Nile Basin Agreement[380] and the 2015 GERD Agreement[381] demonstrate the Nile basin states' acceptance of the equitable and reasonable utilization principle. Unlike in the Nile basin, there are river basins where it seems some riparian states do not even pretend to have heard of equitable and reasonable utilization. The Mekong and Indus river basins are good examples. Just like in the Nile basin, the 1997 UN Watercourses Convention is not very popular in the Mekong and Indus basins: In the Mekong, only Vietnam is a party to the convention;[382] in the Indus, neither India nor Pakistan is a party to the convention[383]. But as will be shown presently, compared to the riparian states in the Mekong and Indus basins, the Nile basin states seem to have traveled much further along in terms of living by international water law principles.

[380] 2010 Nile Basin Agreement, *supra* note 232.
[381] GERD Agreement, *supra* note 171.
[382] Phan, *infra note* 384, at 113.
[383] Christopher R. Rossi, *Blood, Water, and the Indus Waters Treaty*, 29 MINN. J. INT'l L. 103, 145 (2020).

The Mekong River Basin

The Mekong is the seventh largest river in Asia.[384] Originating in Tibet, it flows through six countries: China, Myanmar, Laos, Thailand, Cambodia, and Vietnam.[385] Running for 4,350 kilometers before emptying into the South China sea, the Mekong is the world's 12th longest river.[386] It drains an area of 795,000 square kilometers and discharges 457 BCM of water annually.[387] The annual discharge comes to about six times that of the Blue Nile river.[388] The academic literature treats the Mekong river basin as being made of two parts: an Upper Mekong Basin (URB) and a Lower Mekong Basin (LRB). The riparian states in the upper basin are China and Myanmar; the riparian states in the lower basin are Laos, Thailand, Cambodia, and Vietnam.[389]

More than sixty million people depend on the Mekong for their livelihood.[390] The livelihood of these sixty million people is now under threat from climate change and the construction of hydropower dams.[391] The Mekong runs along extensive coastlines and major deltas sitting at sea level, making it vulnerable to salt intrusion from rising sea levels.[392] The other threat to the river is the construction of hydropower dams along both the upper and lower basins. Thus far, China has built eight hydropower dams in the upper basin and is planning to build at least twelve more.[393] Chinese dam construction in the upper basin leaves downstream countries at China's mercy. This was demonstrated in 2016 when Vietnam, faced with severe drought, had to

[384] Lynn Phan, *The Sambor Dam: How China's Breach of Customary International Law Will Affect the Future of the Mekong River Basin*, 32 GEO. ENVTL. L. REV. 105, 106 (2019).
[385] *Id*.
[386] Xiangqian Gong, *China's Major Move Forward for the Community of Shared Future of the Lancang-Mekong Water*, 9 J. E. Asia & INT'l L. 221, 222 (2016).
[387] *Id*.
[388] *See supra* note 19.
[389] Phan, *supra* note 384.
[390] *Id*.
[391] *See generally* Phan, *supra* note 384.
[392] *Id*.
[393] *Id*., at 107.

ask China to let it have some water. China obliged by opening the floodgates of the Jinghong Dam and letting water flow to Vietnam.[394] China allowed Vietnam a strict ration of about 2,000 cubic meters of water on a daily basis between March 14 and April 10, 2016.[395] China denies that drought in the lower basin countries has anything to do with its dam construction upstream. Instead, it attributes all the problems downstream to climate change.[396] Over 55% of the sediment flow in the Mekong originates in China.[397] According to UNESCO, Chinese dam construction could cause a 94% reduction in sediment flow. The sediment and its attached organic matter are critical for fishing and rice farming.[398]

However, China is not the only country in the Mekong basin building dams. Laos and Cambodia are already constructing or are planning to construct eleven dams in the lower Mekong basin.[399] The Mekong River Commission (MRC), a body established by the 1995 Mekong River Basin Agreement[400], estimated that the construction of the eleven dams in the lower basin would cause the loss of up to 42% of the fish in the river system, displace approximately 100,000 people and threaten food security for over 2 million people.[401] This would mean a loss of about $500 million annually due to the reduction of fish supplies. [402]

The 1995 Mekong Agreement

The lower riparian states on the Mekong river tried to establish rules for water utilization by entering into an agreement. On April 5, 1995, Cambodia, Laos, Thailand and Vietnam signed

[394] *Id*., at 108.
[395] Gong, *supra* note 386.
[396] *Id*., at 225.
[397] *Id*., at 222.
[398] Phan, *supra* note 384, at 107-08.
[399] *Id*., at 108.
[400] Mekong Agreement, *infra* note 403.
[401] Phan, *supra* note 384, at 108.
[402] *Id*.

the Mekong Agreement.[403] The four countries in the lower Mekong Basin who made the agreement are home to approximately a quarter billion people.[404] Before this agreement, there was no formal rule governing water utilization in the basin.

The Mekong Agreement established an intergovernmental organization – the Mekong River Commission (MRC) – tasked with managing the use, development, and conservation of resources in the Mekong River Basin.[405] The upper basin countries China and Myanmar were not parties to the agreement. Instead, they became "dialogue partners" to the MRC in 1996. As dialogue partners, they are not subject to the MRC but participate in meetings and discussions on the development of the Mekong river.[406] Because the upper riparian states China and Myanmar are not members of the commission, the agreement is ineffectual. Since becoming a dialogue partner to the MRC, China has shown no interest in joining the agreement.[407]

The Mekong Agreement sets out a legal framework for cooperation among the lower riparian states.[408] Article 5 provides, in relevant parts: "The parties agree to utilize the waters of the Mekong River system in a reasonable and equitable manner in their respective territories."[409] The parties also agreed to maintain an acceptable minimum monthly flow.[410] Article 11 establishes the MRC.[411] This is all well and good, except for the fact that it is useless because the country from where the water flows, China, is not part of this agreement.

[403] Agreement on the Cooperation for the Sustainable Development of the Mekong River Basin, Chiang Rai, Thailand, Apr. 5, 1995, 34 I.L.M. 864 [hereinafter Mekong Agreement].
[404] Gong, *supra* note 386, at 227.
[405] *Id*., at 109.
[406] *Id*., at 114.
[407] *Id*., at 121.
[408] Mekong Agreement, *supra* note 403, Preamble.
[409] *Id*., art. 5.
[410] *Id*., art. 6(a).
[411] *Id*., art. 11.

In 2016, China and the other five Mekong riparian states created the Lancang-Mekong Cooperation (LMC) to promote cooperation between China and the five lower Mekong riparian states.[412] The LMC parallels the MRC. China exercises great influence over the LMC.[413] Therefore, because of Chinese influence, the LMC took the teeth out of the MRC. This is obvious from the strengthened relations between the upper riparian China and one of the lower riparian states Cambodia. In 2017, Cambodia received a $7 million Chinese grant for various preservation projects on the Cambodian portion of the Mekong.[414] Cambodia has one of the lowest rural electrification rates.[415] Consequently, Cambodia has some of the world's highest electricity costs and has thus prioritized developing hydropower dams.[416] Enter China.

Chinese dam-construction companies offer a low-cost option to carry out projects on the Mekong, tempting Cambodia to seek an alternative route to dam construction on the Mekong river by building diplomatic relations with China outside the MRC framework.[417] Even before the formation of the LMC in 2016, as far back as 2009, China pledged $1 billion in investments to Cambodia's energy sector.[418] By 2016, six hydropower dams, all financed and built by Chinese companies, were producing 47% of Cambodia's domestic energy production.[419] As a member of the MRC, Cambodia should have submitted the planning and construction of these dams to the consultation process set out in the Mekong Agreement.[420] In 2013, Cambodia refused to submit the construction of the Chinese-funded Lower Sesan 2 dam to the MRC's prior consultation

[412] Phan, *supra* note 384, at 114.
[413] *Id*.
[414] *Id*.
[415] Gong, *supra* note 386, at 223.
[416] Phan, *supra* note 384, at 114.
[417] *See generally* Phan, *supra* note 384, at 115.
[418] *Id*.
[419] *Id*.
[420] *Id*.

process. When the dam is fully operational by the end of 2019 or early 2020, it will cause a 9.3% drop in fish stocks across the entire Mekong basin.[421]

One of the other controversial fruits of China-Cambodia bilateral efforts is the Sambor Dam.[422] This dam is designed to be the largest hydropower dam in the Mekong river basin.[423] When completed, it will create an 82 km-long reservoir.[424] The LMC gives China and Cambodia the opportunity to bilaterally construct the Sambor Dam while bypassing the MRC consultation process.[425] Sambor Dam poses an absolute barrier for migratory fish. The proposed dam would result in the loss of 95% of sediment flow and a loss of 40% of nutrient flow to the Mekong Delta rendering the Mekong Delta unsustainable.[426] This would mean the disruption of the livelihood of almost 18 million people in the region.[427] Vietnam's Mekong Delta will be utterly destroyed.[428] The Mekong river experiences the largest migration of fish in the world.[429] Eighty-six different species of long-range migratory fish which inhabit the Cambodian portion of the Mekong will be endangered by the dam.[430] Additionally, the world's remaining eighty or so Irrawaddy Dolphins will also be endangered due to noise pollution from the construction and operation of the dam.[431] Apparently, these Irrawaddy Dolphins cannot hunt or navigate with their sonar capability if their surrounding is too loud.[432]

[421] *Id*.
[422] *Id*.
[423] *Id*., at 115-16.
[424] *Id*.
[425] *Id*., at 121.
[426] *Id*., at 116.
[427] *Id*., at 118.
[428] *See generally* Phan, *supra* note 384, at 118.
[429] *Id*., at 118.
[430] *Id*., at 119.
[431] *Id*.
[432] *Id*.

The damming of the Mekong river is a significant threat to its long-term sustainability.[433] Whereas the main issue in the Blue Nile basin is water allocation among Egypt, Sudan and Ethiopia, the main issue in the Mekong basin is the interruption of sediment flow and fish migration which affects agricultural production and fishing downstream. The issues involved in the Blue Nile and Mekong basins seem inapposite. And the Mekong river basin is a bit more complex than the Blue Nile river basin since the number of difficult neighbors in the former is double that in the latter. However, there is at least one valuable lesson for the Blue Nile riparian states:

Lower riparian states can sign as many agreements as they want amongst themselves. Unless somehow the law of gravity changes and water starts flowing uphill, the upper riparian state of an international river will always be an important source of water for a lower riparian state. The lower Mekong riparian states made the Mekong Agreement without the upper riparian states China and Myanmar.[434] The consequence was, China created a parallel structure (the LMC), thereby rendering the agreement the lower riparian states made among themselves utterly useless. As is evident from the Mekong case, a consortium of lower riparian states can get nowhere without involving the upper riparian states.

The Indus River Basin

The Indus is the 12th largest river system in the world, with a discharge volume twice that of the Nile river.[435] The Indus river system originates on the Kailash Parbat mountain in the southwestern Tibet Autonomous Region of China. It flows for 3,200 kilometers through the disputed Kashmir region before entering Pakistan and emptying into the Arabian Sea near the port

[433] *Id*., at 121.
[434] *Id*.
[435] Rossi, *supra* note 383, at 125.

city of Karachi. The river covers 1.12 million square kilometers and fans out among China, Afghanistan, India and Pakistan. Nearly two-thirds of the Indus flows through Pakistan.[436]

The Indus river basin is made up of six rivers. Four of the six rivers flow from India. These are the Jhelum, Chenab, Ravi, and Beas. A fifth river, the Sutlej, flows from the Tibetan Plateau. A sixth river, the Kabul, flows from Afghanistan.[437] Parenthetically, it would have been easier to think of the six rivers as tributaries since they join to form the Indus. However, article I(3) of the Indus Waters Treaty (IWT) specifically says they are not tributaries but rivers.[438]

British colonial authorities created the modern irrigation system for what are now the states of India and Pakistan.[439] In those days of colonial rule, the Indus river basin was administered as a single entity. The British started building canals in the basin in 1817.[440] By 1947 when they relinquished control of their colonies in this region, they had turned 28 million acres of land in the Indus basin into irrigated land. For its time, this was the largest integrated state-controlled irrigation system in the world.[441] Because the British administered the Indus basin as a unified hydrologic entity and never intended the basin to be divided among different units operated by different countries, the irrigation and canal infrastructure they built functioned as a single unit.[442] This hydrologic unity which had allowed the development of an extensive canal system over 130 years of imperial rule, ended with the partition of the British colony into India and Pakistan.[443]

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[436] *Id*., at 125-26.
[437] *Id*.
[438] IWT, *infra* note 445, art. I(3).
[439] Rossi, *supra* note 383, at 127.
[440] *Id*., at 128.
[441] *Id*.
[442] *Id*., at 130.
[443] *Id*., at 128.

The Indus Waters Treaty (IWT)

Beginning in 1952, the newly independent states of India and Pakistan started negotiations on how to utilize the waters of the Indus river basin. The World Bank sponsored the effort. The negotiations eventually led to the conclusion of an agreement.[444] On September 19, 1960, India and Pakistan signed the Indus Waters Treaty (IWT).[445] The treaty established cooperation for the sharing of the waters of the Indus river basin between the two states.[446] India and Pakistan intended the IWT to fix and delimit their respective rights and obligations as this was necessary for attaining the most complete and satisfactory utilization of the waters of the Indus river basin.[447]

Some scholars call the arrangement established by the IWT a "hydrologic divorce".[448] In effect, the treaty partitions the Indus river system into two geographic portions.[449] The treaty prescribes a simple water allocation formula between India and Pakistan: the three eastern rivers in the Indus basin are allotted to India and the three western rivers in the basin are allotted to Pakistan.[450] The IWT gave Pakistan control over about 166.5 BCM of water from the three western rivers, while giving India control over about 40.7 BCM of water from the three eastern rivers.[451] There are exceptions to this arrangement which allow the country through which the rivers flow the right to utilize the waters for essential uses.[452]

Article II(1) of the IWT provides: "All the waters of the Eastern Rivers shall be available for the unrestricted use of India, except as otherwise expressly provided in this Article."[453] The

[444] Rossi, *supra* note 383, at 131.
[445] Indus Waters Treaty, Karachi, Pakistan, India-Pak., Sep. 19, 1960, 126 U.N.T.S. 6032 [hereinafter IWT].
[446] Waseem Ahmad Qureshi, *The Indus Basin: Water Cooperation, International Law and the Indus Waters Treaty*, 26 MICH. St. INT'l L. REV. 43, 45 (2017) [hereinafter Qureshi, *The Indus Basin*].
[447] IWT, *supra* note 445, Preamble.
[448] Rossi, *supra* note 383, at 134.
[449] *Id*., at 132.
[450] Qureshi, *The Indus Basin*, *supra* note 446, at 48.
[451] Rossi, *supra* note 383, at 134.
[452] *Id*., at 132.
[453] IWT, *supra* note 445, art. II(1).

treaty defines the Eastern Rivers to mean the Sutlej, Beas and Ravi taken together.[454] Article II(1) has three main exceptions which allow Pakistan to utilize the waters of the Eastern Rivers for domestic use[455], non-consumptive use[456] and agricultural use[457]. The IWT defines domestic use as the use of water including for drinking, washing, household and municipal purposes (including use for household gardens) and industrial purposes.[458] The treaty defines non-consumptive use as the use of water for navigation, fishing, etc., excluding the generation of hydroelectric power.[459] The parties are required "not to materially change" the Eastern and Western Rivers when utilizing the waters for non-consumptive use.[460] Agricultural use under the IWT means "the use of water for irrigation, except for irrigation of household gardens and public recreational gardens."[461] To put it simply, article II(1) gives India the right to the unrestricted use of the Eastern Rivers and Pakistan the right to use the same for all manner of things except hydroelectric power generation.

Article III(1) does the same thing with the Western Rivers what article II(1) does with the Eastern Rivers but for Pakistan. This provision provides, in relevant parts: "Pakistan shall receive for unrestricted use all those waters of the Western Rivers which India is under obligation to let flow. . . ."[462] The treaty defines the Western Rivers to mean the Indus, Jhelum and Chenab taken together.[463] Paragraph 2 of article III obligates India to let flow all the waters of the Western Rivers and not to interfere with these waters, except for domestic use, non-consumptive use, agricultural use, and the generation of hydroelectric power.[464] In other words, article III(1) gives

[454] *Id*., art. I(5).
[455] *Id*., art. II(2)
[456] *Id*.
[457] *Id*., art. II(3).
[458] *Id*., art. I(10).
[459] *Id*., art. I(11).
[460] *Id*., art. IV(2).
[461] *Id*., art. I(9).
[462] *Id*., art. III(1).
[463] *Id*., art. I(6).
[464] *Id*., art. III(2).

Pakistan the right to the unrestricted use of the Western Rivers and India the right to use the same for all manner of things, including hydroelectric power generation.

The language in the two provisions, articles (II)(1) and III(1) of the IWT, are somewhat confusing. The provisions get clearer when one focuses on the hydroelectric power generation issue. According to article II(1), India can generate hydroelectric power on the Eastern Rivers but Pakistan cannot. And according to article III(1), both India and Pakistan can generate hydroelectric power on the Western Rivers.

Another important feature of the IWT is the Permanent Indus Commission. Article VIII(1) of the IWT provides, in relevant parts:

> India and Pakistan shall each create a permanent post of Commissioner for Indus Waters. . . . Each commissioner will be the representative of his government for all matters arising out of this Treaty, and will serve as the regular channel of communication on all matters relating to the implementation of the Treaty. . . .[465]

The two commissioners designated by India and Pakistan together form the Permanent Indus Commission.[466] The Commission's job is "to establish and maintain co-operative arrangements for the implementation of this Treaty"[467] and also to settle differences.[468] Article IX sets out specific procedures for the settlement of differences and disputes between the parties.[469]

Some scholars consider the IWT as one of the world's most successful transboundary water treaties which has led to decades-long cooperation between two otherwise hostile countries.[470] India and Pakistan have fought four major wars since the British quit the region: in 1947, 1965, 1971 and 1998.[471] One of the main issues India and Pakistan keep fighting over is Kashmir.[472]

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[465] *Id*., art. VIII(1).
[466] *Id*., art. VIII(3).
[467] *Id*., art. VIII(4).
[468] *Id*., art. VIII(4)(b).
[469] *Id*., art. IX.
[470] Rossi, *supra* note 383, at 122-23.
[471] Qureshi, *The Indus Basin*, *supra* note 446, at 55-56.
[472] *Id*., at 54.

Neither is willing to compromise over Kashmir.[473] The trouble with Kashmir is, it is a source of several important tributaries which feed into the Indus river system and both countries want to be the upper riparian state lording it over the other.[474] Pakistan controls a third of Kashmir's territory. Pakistan calls this territory Azad Kashmir. India controls the remaining two-thirds of Kashmir. India refers to this portion as Jammu and Kashmir. The Indian portion of Kashmir has major sources of water.[475] In addition to the Kashmir issue or perhaps because of it, terrorism is the other issue that has embittered the two countries. India and Pakistan trade accusations whenever a terrorist attack occurs. When the one state is attacked, it always points to the other as being involved.[476] However, despite their obvious dislike for one another, the governments of India and Pakistan have managed to keep the arrangement set out in the IWT going. This is the singular achievement of the treaty.[477]

The IWT is an example of an agreement that succeeded in establishing cooperation between two enemies.[478] However, Indian-Pakistani cooperation on water issues deteriorated when India started building dams upstream.[479]

In 2005, Pakistan formally objected India's construction of a 900-Megawatt gravity dam on the Chenab river in Indian-controlled Kashmir. India had formally shared its plans with Pakistan as far back as 1992, before starting construction of the dam in 1999. Pakistan complained India was trying to control the flow of the Western Rivers which the IWT reserved for Pakistan's

[473] *Id*.
[474] *Id*., at 56.
[475] *Id*., at 56-57.
[476] *Id*., at 54.
[477] *Id*., at 57.
[478] *Id*., at 77.
[479] *Id*., at 45.

unrestricted use.[480] But as already discussed, article III(1) allows India to build hydroelectric dams on the Western Rivers.[481]

In the 2013 *Kishenganga Arbitration* case, Pakistan contested India's proposal to build a hydroelectric plant on the Kishenganga tributary of the Jhelum river in Indian-controlled Jammu and Kashmir.[482] India's plan was to divert the waters through a tunnel to an electric power station and then return the waters to a lower tributary of the Jhelum. Pakistan was at the time planning its own hydroelectric power plant downstream. Pakistan sought arbitration because it saw the Indian project as affecting its own project downstream by altering the natural flow of the Jhelum tributary. The Court of Arbitration granted a partial award. The partial award allowed India to carry on its project, provided: (1) it did not permanently alter the full flow of the river to its natural channel; and (2) it took into account existing Pakistani uses. The Court also held that India must maintain a minimum flow, the amount of which would be determined in a final award.[483] In the final award, the Court stated that the IWT cannot be substituted by customary international water law because the treaty expressly limited the extent to which the Court may apply sources of law beyond the treaty itself.[484] The World Bank, the original sponsor of the IWT, proposed the appointment of a neutral expert per article IX(2) of the treaty. The Neutral Expert, a Swiss engineer, assessed Pakistan's complaint[485] and ultimately found for India[486].

India has twenty-seven water storage projects and dams in the area of the Western Rivers which are of concern to Pakistan.[487] The most prominent of these Indian projects and dams are the

[480] Rossi, *supra* note 383, at 148.
[481] IWT, *supra* note 445, art. III(1).
[482] Rossi, *supra* note 383, at 145.
[483] *Id*., at 146-47.
[484] *Id*., at 147-48.
[485] *Id*.
[486] *Id*., at 150-51.
[487] Qureshi, *The Indus Basin*, *supra* note 446, at 52-53.

Kishenganga dam on the Neelum and Jhelum rivers, the Baglihar, Ratle, Salal and Dul Husti dams on the Chenab river, and the Wullar Barrage on the Indus river.[488] According to Pakistan, these projects significantly affect the natural flow of water in the Western Rivers, and therefore, are a threat to Pakistani irrigation.[489] As discussed above, the dispute around the Kishenganga dam ended with the Court of Arbitration's final award which allowed the Indian project to proceed.

Pakistan contends Indian water storage facilities and dams along the Western Rivers have the capacity to deprive it of water.[490] Pakistan maintains, these Indian facilities have the potential to cause it significant harm by substantially decreasing the flow of water to the Western Rivers.[491] Pakistan's contention is not without some foundation. In a September 2016 national security meeting held following a terror attack in Uri, a town in the Indian portion of Kashmir, Indian Prime Minister Narendra Modi promised to stop the Indus river from flowing to Pakistan and instead to bring it to Indian households. Mr. Modi observed, "Blood and water cannot flow together."[492] His government takes the position that stopping the flow of water to Pakistan would not violate the Indus Waters Treaty.[493]

Technically, Mr. Modi's plan to bring the waters of the Indus into Indian households does not violate the IWT. Article III(2) allows India to utilize the Western Rivers for domestic use. The IWT defines domestic use to include drinking, washing, household and municipal purposes.[494] So, the Prime Minister's plan to bring the waters of the Western Rivers to Indian households is literally allowed by the IWT. Pakistan's concern is not that such Indian activities violate the IWT. Its concern is that Indian dams would affect water supply downstream even if such dams met the

[488] *Id*.
[489] *Id*.
[490] *Id*., at 51-52.
[491] *Id*.
[492] Rossi, *supra* note 383, at 119-20.
[493] *Id*., at 120-21.
[494] IWT, *supra* note 445, art. I(10).

technical letter of the treaty. Pakistan also argues, when not diverting water, India weaponizes it by releasing torrents without notice, causing floods in Pakistan.[495] India considers this argument as nothing but typical Pakistani obstructionism.[496] However, despite the never-ending back-and-forth between India and Pakistan, the IWT serves as a durable example of international law's ability to promote cooperation even among archrivals.[497]

The lesson the Blue Nile basin countries should take from the Mekong basin is that the lower riparian countries can get nowhere by agreeing amongst themselves and excluding the upper riparian countries. The lesson the Blue Nile basin countries should take from the Indus river basin is that the upper riparian countries must accept the fact that the lower riparian countries will never stop complaining no matter what. The upper riparian states must learn to live with this fact and must simply carry on with their lawful projects. Pakistan does not argue India violated the IWT. Instead, it argues it needs more water despite the arrangement set out by the treaty. When there is no treaty that accounts for the interests of both the upper and lower riparian states, as was clear from the Mekong case, there will be a dispute. And even when there is an agreement that divides the waters between the upper and lower riparian states, as shown in the Indus basin case, there will still be a dispute. The planet is not producing more water than it already has. Unless by some miracle water can be turned into more water – arguably a more useful miracle than the one that turned water into something else, all riparian states must face the fact that, regardless of the arrangements they set out in their water treaties, available water resources will be decreasing.

[495] Rossi, *supra* note 383, at 121.
[496] *Id*., at 135-36.
[497] *Id*., at 151.

VII. ARGUMENTS AND RESPONSES

This part attempts to address some possible arguments against the main conclusions reached in parts III, IV and V above. In part III, the conclusion was reached that Ethiopia's first filling of the GERD violated the equitable and reasonable utilization principle of international water law. In part IV, the conclusion was reached that Ethiopia committed an internationally wrongful act during the first filling of the GERD. And in part V, the conclusion was reached that Egypt and Sudan would be entitled to full reparations from Ethiopia. Below, some possible arguments against these conclusions are set out, followed by the response.

Argument 1: *This paper seems to indicate that there was no way Ethiopia could have conducted the first filling of the GERD without violating the equitable and reasonable utilization principle. The evolution of international water law shows, every riparian state has at least some rights on the waters of an international river. Therefore, just like the lower riparian states Sudan and Egypt, the upper riparian state Ethiopia has the right to equitably and reasonably utilize the waters of the Blue Nile river.*

Response: There was no way Ethiopia could have conducted the first filling of the GERD without violating the equitable and reasonable utilization principle. The definition of equitable and reasonable utilization set out in principle IV(e) of the GERD Agreement requires Ethiopia to take into account existing uses of the waters of the Blue Nile river.[498] The facts indicate that Ethiopia did not take into account the existing uses of the waters when it conducted the first filling of the GERD between July 15 and 22, 2020. This outcome sounds inequitable. However, Ethiopia willingly agreed to do this seemingly inequitable thing. Ethiopia has the right to equitably and reasonably utilize the waters of the Blue Nile river, except that to equitably and reasonably utilize

[498] *See supra* note 174.

the waters means Ethiopia taking into account the existing uses. The existing uses allow Egypt and Sudan a 100% of the waters flowing from Ethiopia. Why Ethiopia agreed to this seemingly inequitable arrangement is beyond comprehension. The existing use arrangement clearly disadvantages Ethiopia, and yet, Ethiopia agreed to take it into account. Incomprehensible though it may be, this was not the first time Ethiopia signed an agreement disadvantageous to itself. The 1902 UK-Ethiopia Treaty is the best example of Ethiopia entering into an agreement which is detrimental to its own interests. As discussed already, in article III of the 1902 agreement, the Ethiopian Emperor Menelek agreed with Britain not to build a dam in his own country without British permission.[499] As shown above in part II, Sudan and Egypt did not succeed Britain to this treaty. This thesis focused on the legal issues involved regarding a specific event, namely the first filling of the GERD between July 15 and 22, 2020. A thoroughgoing analysis of the political forces that led to Ethiopia signing the 1902 agreement with Britain and the 2015 GERD Agreement with Egypt and Sudan is outside the scope of this thesis. Needless to say, whatever the political needs of the moment, international agreements are supposed to be thoroughly read and their implication clearly understood before they are signed. The facts indicate, Ethiopia conducted the first filling of the GERD during the rainy season and had made its plans public well in advance. Even so, Ethiopia cannot touch the Nile waters without violating the equitable and reasonable utilization principle. This is because the principle requires Ethiopia to take into account existing uses which give 100% of the waters to Egypt and Sudan.

Argument 2: *Taking into account existing uses does not prevent Ethiopia from withdrawing water from the Blue Nile river.*

[499] *See supra* note 184.

Response: The ICJ's *Gabcikovo-Nagymaros* decision shows that a state cannot assume unilateral control of a shared resource without violating the equitable and reasonable utilization principle.[500] Moreover, according to the Court's decision in *Pulp Mills*, a riparian state's utilization of a shared resource could not be considered to be equitable and reasonable if the interests of other riparian states in the shared resource were not taken into account.[501] At the time of writing, it is not clear whether Ethiopia assumed unilateral control of the Blue Nile river during the first filling of the GERD. However, Ethiopia failed to take into account the existing uses of the river which give all the waters of the Blue Nile to Egypt and Sudan. Therefore, Ethiopia's reduction of the water flow by any amount violates the equitable and reasonable utilization principle.

Argument 3: *The existing uses of the waters of the Blue Nile river established by the 1959 agreement allocates all the waters of the Blue Nile river to Egypt and Sudan. This itself violates the equitable and reasonable utilization principle of international water law. Therefore, Ethiopia cannot be bound by the existing use arrangement.*

Response: It is true, the 1959 agreement violates the equitable and reasonable utilization principle. But also true is the fact that Ethiopia agreed to take this very inequitable arrangement into account when utilizing the waters of the Blue Nile river. Ethiopia could renegotiate the 2015 GERD Agreement; it has not done so. As long as the 2015 agreement stands, Ethiopia cannot touch the waters of the Blue Nile river without violating the equitable and reasonable utilization principle.

Argument 4: *Ethiopia contributes all of the waters of the Blue Nile river. Egypt and Sudan contribute absolutely nothing. In the 1959 agreement, Egypt and Sudan divided the waters among themselves without so much as consulting Ethiopia. This sort of unilateralism on the part of the*

[500] *See Gabcikovo-Nagymaros*, *supra* note 271.
[501] *See Pulp Mills*, *supra* note 272.

lower riparian states justifies Ethiopia's unilateralism on the GERD issue. The American example of the Harmon doctrine and also the Mekong and Indus river basin examples show that upper riparian states always act according to their interests. If anything, Ethiopia's withdrawal of 4.9 BCM out of a yearly discharge of 84 BCM was very gentle compared to what China and India were doing in the Mekong and Indus basins, respectively. So, Ethiopia was justified in impounding the water it needed for the first filling of its hydroelectric dam. If anything, it would be justified to impound as much water as it needs to fill the dam in the future.

Response: Gently or otherwise, Ethiopia violated an agreement it has made with the lower riparian countries. China never made such as agreement in the Mekong Basin. And India made an agreement which, according to the Court of Arbitration and also Pakistan, it has not violated. An argument that Ethiopia can take as much water as it wants to fill the GERD is a political and not a legal one. The conclusions reached in this thesis are on the legal and not the political issues. As for justification, there is no such thing under the rubric of international water law. Customary international water law[502] as well as the GERD Agreement[503] rely on the equitable and reasonable utilization principle as water allocation strategy. Moreover, an internationally wrongful act is never justified. If the act of a state meets all the elements set out in article 2 of ARSIWA[504], such act is an internationally wrongful act which entails the international responsibility of that state[505]. Ethiopia argues its conduct is justified for the simple reason that it is the sole contributor of the waters of the Blue Nile river. The problem with this argument is that it presupposes an alternate reality in which Ethiopia does not have the obligation to refrain from acts which would defeat the

[502] *See supra* note 165.
[503] *See supra* note 174.
[504] ARSIWA, *supra* note 337, art. 2.
[505] *Id*., art. 1.

object and purpose of the 2015 GERD Agreement.[506] But in the real world, Ethiopia has that obligation.

Argument 5: *Population is increasing in the entire Blue Nile basin region. It is very likely, sooner or later, Ethiopia will want to use the Blue Nile waters for irrigation and consumption, and rightly so.*

Response: The 2015 GERD Agreement is specifically designed to govern issues around this one dam. However, in the event the Blue Nile basin countries do not enter into further agreement, customary international water law would govern issues beyond the dam; that is, the equitable and reasonable utilization and the no significant harm principles would govern any issue related to irrigation and consumption.

Argument 6: *Sudan and Egypt have not shown injury due to Ethiopia's first filling of the GERD. Therefore, they should not be entitled to any remedy.*

Response: At the time of writing, Sudan and Egypt have not shown the injury to them due to Ethiopia's first filling of the GERD. However, this argument supposes injury to mean only actual harm. Under ARSIWA, an internationally wrongful act, regardless of actual harm, causes an injury and such injury is made right by full reparation in the form of restitution, compensation or satisfaction.[507] The injured states decide what form reparation should take.[508] Compensation seems the most practical alternative in the present case. However, it is up to Sudan and Egypt to decide what they want for reparations. At the present time, the two countries have condemned Ethiopia's actions but have not yet claimed they were injured.[509] Whenever they do, they have the option of deciding the form of reparation they would like.

[506] *See generally* VCLT, *supra* note 200, art. 18.
[507] ARSIWA, *supra* note 337, art. 34.
[508] *Id*., art. 43(2)(b).
[509] *See supra* note 17.

Argument 7: *If Egypt and Sudan are entitled to full reparations from Ethiopia for its internationally wrongful act, and the ICJ does not have jurisdiction over the matter, how can they obtain relief?*

Response: At least two things can happen that would give ICJ jurisdiction over the present issue: Egypt and Sudan can join or accede to the 2010 Nile Basin Agreement or Ethiopia can accept the ICJ's jurisdiction as compulsory. If Egypt and Sudan decide to join the 2010 Nile Basin Agreement, article 34(1)(a) of the agreement would allow the two states to submit their dispute with Ethiopia to the ICJ.[510] Based on article 36(1) of the ICJ Statute, the Court would have jurisdiction over the issue. Besides extending ICJ jurisdiction to disputes between the Nile Basin States, the 2010 Nile Basin Agreement offers practically the same protections as the 2015 GERD Agreement. Both agreements rely on the equitable and reasonable utilization principle.[511] The other thing that can happen that would give ICJ jurisdiction over the present dispute is Ethiopia accepting the Court's jurisdiction as compulsory. If Ethiopia accepts the ICJ's jurisdiction as compulsory, Egypt and Sudan would be able to bring the dispute to the Court. If Ethiopia does not accept the Court's jurisdiction as compulsory, and Egypt and Sudan do not join the 2010 Nile Basin Agreement, their only resort is principle X of the GERD Agreement, which would direct the parties to seek a political solution by referring the dispute to the Heads of the three governments.[512]

CONCLUSION

Ethiopia's first filling of the GERD violated the equitable and reasonable utilization principle because Ethiopia failed to take into account the existing uses of the waters of the Blue Nile river as it had agreed to do in the GERD Agreement. Ethiopia's violation of the equitable and

[510] *See supra* note 371.
[511] *See supra* notes 174, 235 and 236.
[512] *See supra* note 374.

reasonable utilization principle is also an internationally wrongful act for which it would owe Egypt and Sudan full reparations. However, Egypt and Sudan cannot obtain relief from the ICJ because the Court does not have jurisdiction over the dispute. Ultimately, the dispute may have to be resolved at the political level.

No nation, sovereign though it may be, can utilize water without some deference to the countries with which it shares the life-sustaining resource.[513] Any attempt to confine or subject to exclusive control the waters of an international river is futile.[514] However, this seems to be a concept lost on the Blue Nile basin states. It looks as if each of them thinks the principle applies only to the other states and not to itself. The international legal principle of *jus cogens* holds good neighborliness as paramount for harmonious international relations.[515] It is hardly being good neighbors when one state, regardless of its position as an upper or lower riparian state, denies another the right to utilize a common resource.

The Nile basin is known as a potential flashpoint for conflict on account of "the prevalence of inequitable water utilization and acrimonious inter-riparian relations."[516] That is why an ideal solution to the Nile issue will be hard to find: Egypt refuses to abandon its colonial-era claim while upstream states are rapidly developing requirements to use the same water.[517] Ethiopia claims an equitable and reasonable right to build the GERD, while Egypt maintains its right to be free from significant harm that it claims would be caused to it by the dam.[518] Stuck in the middle is Sudan. Claim of ownership by any state over the entire flow of the Nile would inevitably crumble if and

[513] Stephanie M. Smith, *The Damming of Nature: How China Is Expanding Its Dam Infrastructure and Potential Negative Downstream Effects on Fisheries of the Yaluzangbu-Brahmaputra River*, 9 GOLDEN GATE U. ENVTL. L.J. 269, 276 (2016).
[514] Meshel, *Swimming against the Current*, *supra* note 48, at 139.
[515] Macneill, *supra* note 332, at 88.
[516] Mekonnen, *supra* note 36, at 255.
[517] Richards, *supra* note 26, at 21.
[518] Meshel, *Swimming against the Current*, *supra* note 48, at 141.

when major projects like the GERD become reality.[519] There is no alternative to cooperation to achieve fair and equitable utilization.[520] The back-and-forth between Egypt and Ethiopia, with Sudan in between them, has gone on for centuries.[521] There is no telling if they will sort out their issues even before the end of times, but the hope is, at some point they might learn to "set aside their egoistic national interests"[522].

[519] Mekonnen, *supra* note 36, at 263.
[520] Chelkaba, *supra* note 20, at 174.
[521] *See generally* Udobong, *supra* note 49, at 470.
[522] Tekuya, *supra* note 19, at 323.

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